



U.S. Department of Energy

National Energy Technology Laboratory



December 15, 2000

Program Research and Development Announcement (PRDA) No. DE-RA26-01NT40891 for "Development of Innovative and Improved Technologies for Subsurface Contaminants."

Prospective Offerors:

The purpose of this Executive Summary Letter is to highlight salient elements of the PRDA. This letter is not an integral part of the PRDA which is a self-contained document. In the event of any conflict between the contents of this Executive Summary Letter and that of the PRDA, the PRDA language will prevail.

The National Energy Technology Laboratory (NETL) is soliciting for offers to expedite applied research, development and demonstration of innovative and improved technologies to meet the needs in the area of subsurface contaminants. The three research areas anticipated in this PRDA are: (1) characterizing, monitoring, modeling, and analysis, (2) separations and reactive treatments in the subsurface, and (3) validation, verification, and long-term monitoring of contaminants and treatment. The Government requirements are detailed in the Statement of Program Objectives contained in Section J, Attachment A.

Each offer will be objectively reviewed on its own merit against the evaluation criteria stated in the PRDA using technical, scientific and/or peer reviewers, some of whom may be non-Governmental personnel. Should an offeror object to review of their proposals by individuals other than Government employees it shall so state in Volume I of its proposal. Offerors are, however, cautioned that the DOE may be unable to give full consideration to proposals which indicate that only Government evaluation is authorized.

Individuals, corporations, nonprofit organizations, small and small disadvantaged businesses, educational institutions, and state or local governments or other entities who wish to have a proposal evaluated should respond to the requirements of this PRDA.

Proposals submitted by, or substantially relying upon the technical expertise of, (1) another Federal agency; (2) a Federally Funded Research and Development Center (FFRDC) sponsored by a Federal agency; or (3) a Department of Energy (DOE) Management and Operating (M&O) contractor are not desired, will not be evaluated, and will not be eligible for an award under this solicitation. Offerors are encouraged to maximize the use of private sector organizations in the performance of the proposed effort. However, a proposal that includes performance by a Federally Funded Research

and Development Center or DOE M&O contractor may be considered for award, provided that: (1) the proposed use of any such entities is specifically authorized by the cognizant agency for the FFRDC or the Department of Energy for the M&O contractor in accordance with the procedures established for the FFRDC or the M&O contractor; (2) the proposed work is not otherwise available from the private sector; and (3) the estimated aggregate cost of the FFRDC or M&O contractor(s) work does not exceed 25 percent of the total estimated project cost. DOE reserves the right to fund the work through a DOE field work proposal or an interagency agreement. For specific information, your attention is directed to Provision L-4 of this solicitation entitled "Participation by Federally-Funded Research and Development Centers (FFRDC) And Department of Energy (DOE) Management and Operating (M&O) Contractors."

The DOE anticipates award of a multiple number (2 or more) of Cost Reimbursement (cost-sharing is preferred but not required) contracts; but the DOE reserves the right to award the contract type and number deemed in its best interest.

It is anticipated that this effort would be completed within an estimated period of performance of about 36 months. The estimated cost range for this contract is between \$200,000 to \$500,000. However, this does not preclude consideration of longer or shorter projects at higher or lower costs.

The Government does not anticipate providing any facilities or property for accomplishing this effort. Offerors are encouraged to propose utilization of existing facilities and to make allowances for providing all necessary personnel, facilities, equipment, and materials to complete proposed projects.

Proposals must be submitted in accordance with the requirements of the PRDA (See Part IV, Section L). Offerors are also advised to give particular attention to the evaluation criteria identified in Part V, Section M. Each of the required proposal parts should be bound separately and clearly labeled. The proposals must be received by the Contract Specialist not later than 4:00 p.m. local prevailing time on January 23, 2001, at the address below:

U.S. Department of Energy
National Energy Technology Laboratory
ATTN: James W. Huemrich
P. O. Box 10940
Mail Stop 921-107
Pittsburgh, PA 15236-0940

OR FOR HAND DELIVERED

626 Cochrans Mill Road
Building 921, Room 164
Pittsburgh, PA 15236-0940

Proposals must authorize a period for acceptance by the Government of not less than one hundred eighty (180) calendar days from the date specified for receipt of proposals. Further, you are cautioned that late proposals, modifications, and withdrawals will be treated in accordance with the article in Section L entitled "Instructions to Offerors - Competitive Acquisition."

Please complete and return the enclosed Intention to Propose form at the earliest practicable date. The Intention to Propose form is contained herein in Part IV, Section J, Attachment G.

All requests for explanation or interpretation of any part of the PRDA shall be submitted in writing to the Contract Specialist at the aforementioned address. Questions must be received by the Contract Specialist via E-mail or in writing within 15 calendar days after the issuance of the solicitation to allow sufficient time for a reply to reach all prospective offerors before the submission of their offer. The Government reserves the right not to respond to questions submitted after this period, nor to respond to questions submitted by telephone or in person at any time. If the Government elects to answer the questions, the questions will be answered via an amendment to the solicitation, with copies of both questions and answers included in the amendment, without reference to the originating sources. All amendments will be posted on the NETL Homepage at

“<http://www.NETL.doe.gov/business/solicit/>”;

therefore, offerors are encouraged to periodically check the NETL Homepage to ascertain the status of any amendments as hard copies will not be distributed.

For your information, it is recommended that all prospective offerors download a copy of the DOE “Lobbying Brochure” (<http://www.pr.doe.gov/lobbying.html>) which provides a summary of the statutory and regulatory restrictions regarding lobbying activities for Federal contractors and recipients.

Please note that an automated document writing system has been used to prepare this document. Each provision in the data base has been assigned a number. Not all of the provisions in the data base have been used in this document; therefore, the numbering may not be continuous.

All communications concerning this PRDA should cite the PRDA number and be directed in writing to the attention of the Contract Specialist via mail at the Pittsburgh letterhead address, via fax at (412) 386-6137, or via E-mail at huemmrhc@netl.doe.gov.

Sincerely,

Raymond D. Johnson
Contracting Officer
Acquisition and Assistance Division

Enclosure:

Program Research and Development Announcement (PRDA)

SOLICITATION, OFFER AND AWARD		1. THIS CONTRACT IS A RATED ORDER UNDER DPAS (15 CFR 700) ►		RATING		PAGE OF PAGES 1 110	
2. CONTRACT NO.		3. SOLICITATION NO. DE-RA26-01NT40891		4. TYPE OF SOLICITATION <input type="checkbox"/> SEALED BID (IFB) <input checked="" type="checkbox"/> NEGOTIATED (PRDA)		5. DATE ISSUED DECEMBER 15, 2000	
7. ISSUED BY U.S. Department of Energy National Energy Technology Center P.O. Box 10940, MS 921-107 626 Cochrans Mill Road Pittsburgh, PA 15236-0940		CODE		8. ADDRESS OFFER TO (If other than Item 7)			

NOTE: In sealed bid solicitations, "offer" and "offeror" mean "bid" and "bidder."

SOLICITATION

9. Sealed offers in original and 1 See Provision L.19 copies for furnishing the supplies or services in the Schedule will be received at the place specified in Item 8, or if handcarried, in the depository located in the National Energy Technology Laboratory Building 921, Room 164 until 4:00 pm local time January 23, 2001.
(Hour) (Date)

CAUTION — LATE Submissions, Modifications, and Withdrawals: See Section L, Provision No. 52.214-7 or 52.215-1. All offers are subject to all terms and conditions contained in this solicitation.

10. FOR INFORMATION CALL: ►	A. NAME JAMES W. HUENNRICH		B. TELEPHONE NO. (NO COLLECT CALLS)		C. E-MAIL ADDRESS
			AREA CODE 412	NUMBER 386-6597	EXT. huennric@netl.doe.gov

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(X)	SEC.	DESCRIPTION	PAGE(S)	(X)	SEC.	DESCRIPTION	PAGE(S)
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X	H	SPECIAL CONTRACT REQUIREMENTS	24 - 49	X	M	EVALUATION FACTORS FOR AWARD	104 - 110

OFFER (Must be fully completed by offeror)

NOTE: Item 12 does not apply if the solicitation includes the provisions at 52.214-16, Minimum Bid Acceptance Period.

12. In compliance with the above, the undersigned agrees, if this offer is accepted within 180 calendar days (60 calendar days unless a different period is inserted by the offeror) from the date for receipt of offers specified above, to furnish any or all items upon which prices are offered at the price set opposite each item, delivered at the designated point(s), within the time specified in the schedule.

13. DISCOUNT FOR PROMPT PAYMENT (See Section I, Clause No. 52.232-8) ►		10 CALENDAR DAYS %	20 CALENDAR DAYS %	30 CALENDAR DAYS %	CALENDAR DAYS %
14. ACKNOWLEDGMENT OF AMENDMENTS (The offeror acknowledges receipt of amendments to the SOLICITATION for offerors and related documents numbered and dated:		AMENDMENT NO.		DATE	AMENDMENT NO.
15A. NAME AND ADDRESS OF OFFEROR		CODE	FACILITY	16. NAME AND TITLE OF PERSON AUTHORIZED TO SIGN OFFER (Type or print)	
15B. TELEPHONE NUMBER		15C. CHECK IF REMITTANCE ADDRESS IS DIFFERENT FROM ABOVE — ENTER SUCH ADDRESS IN SCHEDULE <input type="checkbox"/>		17. SIGNATURE	
AREA CODE	NUMBER	EXT.			18. OFFER DATE

AWARD (To be completed by Government)

19. ACCEPTED AS TO ITEMS NUMBERED		20. AMOUNT		21. ACCOUNTING AND APPROPRIATION	
22. AUTHORITY FOR USING OTHER THAN FULL AND OPEN COMPETI-				23. SUBMIT INVOICES TO ADDRESS SHOWN IN (4 copies unless otherwise specified) ►	
24. ADMINISTERED BY (If other than Item 7)				25. PAYMENT WILL BE MADE BY	
CODE				CODE	
				27. UNITED STATES OF AMERICA	
				28. AWARD DATE	
<input type="checkbox"/> 10 U.S.C. 2304(c) () <input type="checkbox"/> 41 U.S.C. 253(c) ()				(Signature of Contracting Officer)	

IMPORTANT — Award will be made on this Form, or on Standard Form 26, or by other authorized official written notice.

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SECTION B - SUPPLIES OR SERVICES AND PRICES/COSTS

B.1 ITEMS BEING ACQUIRED (SOW W/DECISION POINT - PHASES) (SEP 2000-R)

The Contractor shall furnish required personnel, facilities, equipment, material, supplies, and services (except as may be expressly set forth in this contract as furnished by the Government) and otherwise do all things necessary for, or incident to, the performance of the following items of work:

B.1.1 PHASE I:

B.1.1.1 ITEMS BEING ACQUIRED:

Item 1 - Research entitled "Development of Innovative and Improved Technologies for Subsurface Contaminants," in accordance with Part III, Section J, Attachment A, Statement of Work.

Item 2 - Reports as prescribed in accordance with Part III, Section J, Attachment B, "Reporting Requirements Checklist" associated with Item 1 above.

(Not separately priced - included in price of Item 1)

**** IF COST REIMBURSEMENT (NOT COST SHARING):**

B.1.1.2. ESTIMATED COST

The total estimated cost for contract items acquired under Phase I is \$ TBD. No fee shall be paid to the contractor under this contract.

**** IF COST REIMBURSEMENT (COST SHARING):**

B.1.1.2 COST SHARING ARRANGEMENT

The Contractor and the Government agree to share the cost of the effort for Phase I under this contract as follows:

Government:	\$ TBD	TBD %
<u>Contractor:</u>	<u>\$ TBD</u>	<u>TBD %</u>
Total:	\$ TBD	TBD %

NOTICE: NO WORK UNDER THIS CONTRACT SHALL BE AUTHORIZED BEYOND PHASE I WITHOUT SPECIFIC WRITTEN DIRECTION (e.g. issuance of a contract modification) OF THE CONTRACTING OFFICER AS DELINEATED IN ARTICLE B.8 AND H.31.

B.1.2 PHASE II:

B.1.2.1 ITEMS BEING ACQUIRED:

Item 3 - Research entitled "Development of Innovative and Improved Technologies for Subsurface Contaminants," in accordance with Part III, Section J, Attachment A, Statement of Work.

Item 4 - Reports as prescribed in accordance with Part III, Section J, Attachment B, "Reporting Requirements Checklist" associated with Item 3 above.

(Not separately priced - included in price of Item 3)

**** IF COST REIMBURSEMENT (NOT COST SHARING):**

B.1.2.2. ESTIMATED COST

The total estimated cost for the contract items acquired under Phase II is \$ TBD. No fee shall be paid to the contractor under this contract.

**** IF COST REIMBURSEMENT (COST SHARING):**

B.1.2.2 COST SHARING ARRANGEMENT

The Contractor and the Governemnt agree to share the cost of the effort for Phase II under this contract as follows:

Government:	\$ TBD	TBD %
<u>Contractor:</u>	<u>\$ TBD</u>	<u>TBD %</u>
Total:	\$ TBD	TBD %

Note that the costs for Phase II are based on budgetary estimates and are subject to negotiation.

NOTICE: NO WORK UNDER THIS CONTRACT SHALL BE AUTHORIZED BEYOND PHASE II WITHOUT SPECIFIC WRITTEN DIRECTION (e.g. issuance of a contract modification) OF THE CONTRACTING OFFICER AS DELINEATED IN ARTICLE B.8 AND H.31.

B.1.3 PHASE (Additional):

Any additional Phases (if required) will be constructed as shown above.

B.1.4 TOTAL CONTRACT [PHASES I PLUS “OTHERS” (if authorized)]:

The Total Estimated Cost for Items 1, 2, (and any other authorized items) is:

**** IF COST REIMBURSEMENT (NOT COST SHARING):**

B.1.4.1 ESTIMATED COST

The total estimated cost for the contract items acquired is \$ TBD. No fee shall be paid to the contractor under this contract.

**** IF COST REIMBURSEMENT (COST SHARING):**

B.1.4.1 COST SHARING ARRANGEMENT

The Contractor and the Government agree to share the cost of the effort under this contract as follows:

Government:	\$ TBD	TBD %
<u>Contractor:</u>	<u>\$ TBD</u>	<u>TBD %</u>
Total:	\$ TBD	TBD %

B.2. ESTIMATED COST (NOV 1997)

The total estimated cost for the contract items being acquired is \$ TBD. No fee shall be paid to the contractor under this contract.

B.3 COST SHARING ARRANGEMENT (JAN 1999-R)

(a) Estimated Cost

The total estimated cost for the work to be accomplished under this contract is \$ TBD.

(b) Cost Sharing

The Contractor and the Government agree to share the cost of the effort under this contract as follows:

SHARE OF THE ACTUAL COST OF PERFORMANCE

PHASE I:

	<u>Dollar Share</u>	<u>Percent Share</u>
Government:	\$ TBD	TBD %
Contractor:	\$ TBD	TBD %
Total:	\$ TBD	TBD %

PHASE II:

	<u>Dollar Share</u>	<u>Percent Share</u>
Government:	\$ TBD	TBD %
Contractor:	\$ TBD	TBD %
Total:	\$ TBD	TBD %

TOTAL CONTRACT:

	<u>Dollar Share</u>	<u>Percent Share</u>
Government:	\$ TBD	TBD %
Contractor:	\$ TBD	TBD %
Total:	\$ TBD	TBD %

The cost participation formula stipulated under this clause shall be applied to actual, allowable, allocable contract costs incurred as a whole rather than to any individual element of cost. The cost sharing ratio established in this contract will be applied to each and every invoice. In its vouchers and contract cost and/or financial reports, the Contractor shall separately identify: 1) the total allowable costs incurred; 2) the allowable costs incurred to be borne by the Government (dollars and percentages); and 3) the allowable costs to be borne by the Contractor (dollars and percentages).

(c) Government's Obligation

The Government's financial obligation is limited to \$[TBD] on account of performance of the contract as a whole, and is further limited to the amount of funds allocated to this contract at any given time in accordance with the Limitation of Cost or Funds clauses of the contract.

(d) Cost Overrun

The Government funding of cost overruns is subject to availability of funds and FAR 52.232-20 "Limitation of Cost." While it is the purpose of this contract to complete all work within the funds provided in the original or amended award amount, it is hereby agreed that the provision of any funds for the financing or reimbursement of any allowable and allocable cost overruns which may be incurred in the performance of this contract, shall be subject to cost sharing by the Government and Contractor in accordance with the respective percentages indicated above.

The Contractor shall not be obligated to continue performance under the contract (including actions under the termination clause) or otherwise to incur cost in excess of the estimated total cost unless and until the Contracting Officer shall have modified the contract to fund the Government's share.

B.4 CONTRACTOR/THIRD PARTY IN-KIND CONTRIBUTIONS (SEPT 1998)

The value of the in-kind contributions donated by the contractor and/or third party contributors is established in [TBD], below.

In-kind contributions (i.e., services, facility use, etc.) shall be identified on each invoice submitted by the contractor only for the period in which these donated services are actually utilized in performance of this project.

Maximum values are established in [TBD] below, for each in-kind contribution that will be donated toward this project. This maximum amount cannot be exceeded without prior written approval of the Contracting Officer.

The contractor shall be required to maintain the same accounting records and the Government shall have the same rights to audit all costs associated with these Contractor and/or third party in-kind contributions in this contract.

B.5 VALUATION OF IN-KIND CONTRIBUTIONS (SEPT 1998)

The contractor shall, as their in-kind contribution under this contract, provide and furnish the items below as necessary to perform the Statement of Work (Part III, Section J, Attachment A).

NOTE - list applicable items and their respective dollar values, i.e. (a) services, (b) fringe benefits, etc.

The total value placed on the above in-kind/third party contributions is \$ TBD.

The contractor shall furnish as in-kind contribution the actual cost of the items listed above, notwithstanding the estimated costs shown.

B.6 LIMITATION OF FUNDS -- COST SHARING (JUNE 1998)

Pursuant to FAR 52.232-22, "Limitation of Funds", total funds in the amount of \$[TBD] are obligated herewith and made available for payment of the Government share of allowable costs to be incurred from the effective date of this contract through the period estimated to end [TBD].

B.7 LIMITATION OF FUNDS -- COST REIMBURSEMENT (JUNE 1998)

Pursuant to FAR 52.232-22, "Limitation of Funds," total funds in the amount of \$[TBD] are obligated herewith and made available for payment of allowable costs to be incurred from the effective date of this contract through the period estimated to end [TBD].

B.8 MULTIPLE AWARDS -- PHASED ACQUISITIONS (JUNE 1998)

The Government may elect to require the contractor to perform multiple phases as identified in the Statement of Work, Section J, Attachment A. In the event a determination is made to continue into a subsequent phase(s), the Contracting Officer will issue a bilateral contract modification. The total contract value will be increased by the amounts (subject to negotiation) delineated in this Section B for each phase. The period of performance shall be extended in accordance with Article F.1. If it is determined not to continue into a subsequent phase(s), the Contracting Officer will notify the Contractor in writing.

SECTION C - DESCRIPTION/SPECIFICATIONS/WORK STATEMENT

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SECTION C - DESCRIPTION/SPECIFICATIONS/WORK STATEMENT

C.1 STATEMENT OF WORK (NOV 1997)

The Statement of Work is located in Part III -- Section J, Attachment A to this contract.

C.2 ITEM DESCRIPTION

C.2.1 PHASE I:

Item 1 - Research entitled "Development of Innovative and Improved Technologies for Subsurface contaminants (Phase I) in accordance with Part III, Section J, Attachment A, Statement of Work.

Item 2 - Reports as prescribed in accordance with Part III, Section J, Attachment B, "Reporting Requirements Checklist" associated with Item 1 above.
(Not separately priced --- included in price of Item 1 above.)

C.2.2 PHASE II:

Item 3 - Research entitled "Development of Innovative and Improved Technologies for Substance Contaminants," (Phase II) in accordance with Part III, Section J, Attachment A, Statement of Work.

Item 4 - Reports as prescribed in accordance with Part III, Section J, Attachment B, "Reporting Requirements Checklist" associated with Item 3 above.
(Not separately priced --- included in price of Item 3 above.)

C.2.3 PHASE (Additional):

Any additional Phases (if required) will be constructed as shown above.

C.3 REPORTS (MAY 1998)

Reports shall be prepared and submitted in accordance with the reporting requirements described in Part III -- Section J, Attachment B.

C.4 RESULTS OF SCIENTIFIC AND TECHNICAL WORK SUPPORTED BY DOE

The Contractor shall provide such items as scientific and technical reports, journal articles reprints, conference papers and proceedings, theses, translations, etc. which communicate the results of scientific and technical work supported by DOE, whether or not specifically identified in the contract. These results shall be submitted in accordance with the instructions in part III, Section J, Attachment B, Reporting Requirements.

SECTION D - PACKAGING AND MARKING

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SECTION D - PACKAGING AND MARKING

D.1 PACKAGING (FEB 1999)

Preservation, packaging, and packing for shipment or mailing of all work delivered hereunder shall be in accordance with good commercial practice and adequate to insure acceptance by common carrier and safe transportation at the most economical rate(s).

Except for those reports required by the Reporting Requirements Checklist of the contract, which are coded by A (As required) where the urgency of receipt of the report by the Government necessitates the use of the most expeditious method of delivery, reports deliverable under this contract shall be mailed by other than first-class mail, unless the urgency of the deliverable sufficiently justifies the use of first-class mail. The Contractor shall not utilize certified or registered mail or private parcel delivery service for the distribution of reports under this contract without the advance approval of the Contracting Officer except for those reports coded A.

D.2 MARKING (JAN 1999)

Each package, report or other deliverable shall be accompanied by a letter or other document which:

- (1) Identifies the contract by number under which the item is being delivered.
- (2) Identifies the deliverable Item Number or Report Requirement which requires the delivered item(s).
- (3) Indicates whether the Contractor considers the delivered item to be a partial or full satisfaction of the requirement.

For any package, report, or other deliverable being delivered to a party other than the Contracting Officer, a copy of the document shall be simultaneously provided to the office administering the contract, as identified in Section G of the contract, or if none, to the Contracting Officer.

SECTION E - INSPECTION AND ACCEPTANCE

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SECTION E - INSPECTION AND ACCEPTANCE

E.1 INSPECTION (NOV 1997)

Inspection of all items under this contract shall be accomplished by the DOE Contracting Officer's Representative (COR), or any other duly authorized Government representative.

E.2 ACCEPTANCE (MAR 1999)

Final acceptance of all work and effort under this contract (including "Reporting Requirements," if any) shall be accomplished by the Contracting Officer.

E.3 52.246-9 INSPECTION OF RESEARCH AND DEVELOPMENT (SHORT FORM). (APR 1984)

The Government has the right to inspect and evaluate the work performed or being performed under the contract, and the premises where the work is being performed, at all reasonable times and in a manner that will not unduly delay the work. If the Government performs inspection or evaluation on the premises of the Contractor or a subcontractor, the Contractor shall furnish and shall require subcontractors to furnish all reasonable facilities and assistance for the safe and convenient performance of these duties.

SECTION F - DELIVERIES OR PERFORMANCE

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SECTION F - DELIVERIES OR PERFORMANCE

F.1 PERIOD OF PERFORMANCE (NOV 1997-R)

F.1.1 PHASE I:

The work to be performed under the Phase I (Reference Part I, Section, B) shall commence on the effective date of the contract and shall continue for [TBD] months. This includes time for submission of the draft final report, review of the draft by DOE, and submission of the approved final report by the contractor.

NOTICE: The Contractor shall not proceed beyond Phase I without the specific written direction of the Contracting Officer (Reference Article B.1).

F.1.2 PHASE II:

The work to be performed under the Phase II (Reference Part I, Section, B) shall commence upon the date specified in the specific written direction of the Contracting Officer (if provided) and shall continue for [TBD] months. This includes time for submission of the draft final report, review of the draft by DOE, and submission of the approved final report by the contractor.

F.1.3 PHASE (Additional):

Any additional Phases (if required) will be constructed as shown above.

F.2 PRINCIPAL PLACE OF PERFORMANCE (FEB 1998)

The principal place of performance under this contract shall be at the Contractor's facility located in:

[]
[]
[]

F.3 52.242-15 STOP-WORK ORDER. (AUG 1989) -- ALTERNATE I (APR 1984)

- (a) The Contracting Officer may, at any time, by written order to the Contractor, require the Contractor to stop all, or any part, of the work called for by this contract for a period of 90 days after the order is delivered to the Contractor, and for any further period to which the parties may agree. The order shall be specifically identified as a stop-work order issued under this clause. Upon receipt of the order, the Contractor shall immediately comply with its terms and take all reasonable steps to minimize the incurrence of costs allocable to the work covered by the order during the period of work stoppage. Within a period of 90 days after a stop-work is delivered to the Contractor, or within any extension of that period to which the parties shall have agreed, the Contracting Officer shall either -
 - (1) Cancel the stop-work order; or
 - (2) Terminate the work covered by the order as provided in the Default, or Termination clause of this contract.
- (b) If a stop-work order issued under this clause is canceled or the period of the order or any extension thereof expires, the Contractor shall resume work. The Contracting Officer shall make an equitable adjustment in the delivery schedule, the estimated cost, the fee, or a combination thereof, and in any other terms of the contract that may be affected, and the contract shall be modified, in writing, accordingly, if -
 - (1) The stop-work order results in an increase in the time required for, or in the Contractor's cost properly allocable to, the performance of any part of this contract; and
 - (2) The Contractor asserts its right to the adjustment within 30 days after the end of the period of work stoppage; provided, that, if the Contracting Officer decides the facts justify the action, the Contracting Officer may receive and act upon the claim submitted at any time before final payment under this contract.
- (c) If a stop-work order is not canceled and the work covered by the order is terminated for the convenience of the Government, the Contracting Officer shall allow reasonable costs resulting from the stop-work order in arriving at the termination settlement.
- (d) If a stop-work order is not canceled and the work covered by the order is terminated for default, the Contracting Officer shall allow, by equitable adjustment or otherwise, reasonable costs resulting from the stop-work order.

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SECTION G - CONTRACT ADMINISTRATION DATA

G.1 CORRESPONDENCE PROCEDURES (FEB 2000)

To promote timely and effective administration, correspondence (except for invoices and reports) submitted under this contract shall be subject to the following procedures:

(a) **Technical Correspondence**

Technical correspondence (as used herein, this term excludes technical correspondence where patent or technical data issues are involved and correspondence which proposes or otherwise involves waivers, deviations, or modifications to the requirements, terms, or conditions, of this contract) shall be addressed to the DOE Contracting Officer's Representative, with an information copy of the correspondence to the DOE Contract Specialist.

(b) **Property Correspondence**

Property correspondence (as used herein, this term includes correspondence which addresses matters which relate to property issues which come under the contract's Government property provisions) shall be addressed to the DOE Property Administrator, with information copies of the correspondence to the DOE Contracting Officer's Representative and the DOE Contract Specialist.

(c) **Indirect Rate Correspondence**

All correspondence relating to the establishment, revision, and negotiation of billing and final indirect cost rates shall be addressed to the Contracting Officer for Indirect Cost Rate Management, with information copies of the correspondence to the DOE Contract Specialist.

(d) **Correspondence on Patent or Technical Data Issues**

Correspondence concerning patent or technical data issues shall be addressed to the Office of Intellectual Property Law, U.S. Department of Energy, Chicago Operations Office, 9800 South Cass Avenue, Building 201, Argonne, IL 60439.

Information copies of correspondence being sent to the Intellectual Property Law Division shall also be sent to the NETL Patent Attorney, the DOE Contract Specialist, and the Contracting Officer's Representative.

(e) Other Correspondence

All other correspondence shall be addressed to the DOE Contract Specialist with information copies of the correspondence to the DOE Contracting Officer's Representative.

(f) Subject Line(s)

All correspondence shall contain a subject line commencing with the contract number, i.e., DE-AC26-01NT[#####], and identifying the specific contract action requested.

G.2 SUBMISSION OF VOUCHERS/INVOICES (APR 2000)

(a) Voucher Form (SF 1034)

In requesting reimbursement, contractors shall use Standard Form 1034 (Public Voucher for Purchases and Services Other Than Personal), and F4220.50 (Statement of Cost). Electronic versions of the SF1034 and the F4220.50 can be found on the NETL website at <http://www.netl.doe.gov/business/forms/forms.html>. The Statement of Cost shall be supported by the information contained in Paragraph (c) of this clause. Acceptable substitutes for the forms (which provide the same necessary information) may be used.

In accordance with FAR 52.232-25, "Prompt Payment," all invoices shall include the following information:

- (1) Name and address of contractor/vendor
- (2) Invoice date
- (3) Contract number or other authorization for delivery of property or service
- (4) Description, price and quantity of property and services actually delivered or rendered
- (5) Shipping and payment terms
- (6) Name (where practicable), title, phone number and complete mailing address of responsible official to whom payment is to be sent (must be the same as that in the contract or in a proper notice of assignment)
- (7) Name (where practicable), title, phone number and complete mailing address of the person to be notified in the event of a defective invoice.
- (8) Other substantiating documentation or information as required by the contract.

(b) Statement of Cost

The SF 1034 shall be completed so as to make due allowances for the Contractor's cost accounting system. The costs claimed shall be only those recorded costs (including cost sharing) which are authorized for billing by the payment provisions of this contract. If this is a cost-plus-fixed-fee contract, the amount claimed for the fixed fee should be based on a percentage of completion of the work. If this is a cost sharing contract, the "Government Share" must agree with the amount billed on the SF 1034. Any cost sharing or in-kind contributions incurred by the Contractor and/or third party during the billing period must be included in the invoice and adequately supported. Indirect rates claimed shall be billed in accordance with the "Allowable Cost and Payment Clause." The Certification (block 11) must be signed by a responsible official of the Contractor.

(c) Supporting Documentation

Direct costs (e.g., labor, equipment, travel, supplies, etc.) claimed for reimbursement on the Statement of Cost must be adequately supported. The level of detail provided must clearly indicate where the funds were expended. For example, support for labor costs must include the labor category (e.g., program manager, senior engineer, technician, etc.) the hourly rate, and the labor cost per category; equipment costs must be supported by a list of the equipment purchased, along with the item's cost; supporting data for travel must include the destination of the trip, number and labor category of travelers, transportation costs, per diem costs, and purpose of the trip; and supplies should be categorized by the nature of the items (e.g., office, lab, computer, etc.) and the dollar amount per category.

Indirect rates used for billings must be clearly indicated, as well as their basis of application. When the cognizant Administrative Contracting Officer (ACO) or auditor approves a change in the billing rates, include a copy of the approval.

(d) Submission of Voucher

Submit one copy of the original voucher including the certified Statement of Cost and Supporting Documentation to the following payment office:

U. S. Department of Energy
Oak Ridge Financial Services Center
P. O. Box 4787
Oak Ridge, TN 37831

In addition, submit two copies of the voucher including the certified Statement of Cost and Supporting Documentation to the following address:

U. S. Department of Energy
National Energy Technology Laboratory
ATTN: Accounts Payable, MS 921-232
P.O. Box 10940
Pittsburgh, PA 15236-0940

(e) Billing Period

Vouchers shall be submitted no more frequently than monthly (unless prior written consent of the Contracting Officer for more frequent billing is obtained). The period of performance covered by vouchers should be the same as covered by any required monthly technical progress reports and/or monthly cost reports.

(f) Payment Method

In accordance with Mandatory Information for Electronic Funds Transfer Payment, payment under this contract will be made utilizing the Automated Clearing House (ACH) network. The payment system is specifically referred to as "Vendor Express."

(g) Defective Invoices

Invoices that are determined to be defective, and therefore not suitable for payment, shall be returned to the Contractor as soon as practicable, specifying the reason(s) why the invoice is not proper.

(h) Status of Payments

The Oak Ridge Financial Service Center (ORFSC) has a system via Internet, in which contractors can request information about payments by invoice, by contract number, and/or by paid date. The system is called Vendor Inquiry Payment Electronic Reporting System (VIPERS) and is available to contractors at the following website: <http://finweb.oro.doe/vipers.htm>. Contractors must have a federal tax identification number (TIN) and then obtain a personal identification number (PIN) to access the system.

G.3 NOTICE OF INVOICE PROCESSING BY SUPPORT CONTRACTOR (DEC 1999)

A support service contractor performs the function of processing of all invoices submitted to the National Energy Technology Laboratory, against its awards. Therefore, this contractor has access to your business confidential cost/rate information. A special provision in this contractor's award requires the confidential treatment by all contractor employees of any and all business confidential information of other contractors and financial assistance recipients to which they have access.

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SECTION H - SPECIAL CONTRACT REQUIREMENTS

H.1 CONSECUTIVE NUMBERING (JAN 1999)

Due to automated procedures employed in formulating this document, clauses and provisions contained within it may not always be consecutively numbered.

H.2 TECHNICAL DIRECTION (JUNE 1998)

- (a) Performance of the work under this contract shall be subject to the technical direction of the Contracting Officer's Representative (COR). The term "technical direction" is defined to include, without limitation:
 - (1) Directions to the Contractor which redirect the contract effort, shift work emphasis between work areas or tasks, required pursuit of certain lines of inquiry, fill in details or otherwise serve to accomplish the contractual Statement of Work.
 - (2) Provision of written information to the Contractor which assists in the interpretation of drawings, specifications or technical portions of the work description.
 - (3) Review and, where required by the contract, approval of technical reports, drawings, specifications and technical information to be delivered by the Contractor to the Government under the contract.
- (b) Technical direction must be within the scope of work stated in the contract. The COR does not have the authority to, and may not, issue any technical direction which:
 - (1) Constitutes an assignment of additional work outside the Statement of Work;
 - (2) Constitutes a change as defined in the contract clause entitled "Changes";
 - (3) In any manner causes an increase or decrease in the total estimated contract cost, the fixed fee (if any), or the time required for contract performance;
 - (4) Changes any of the expressed terms, conditions or specifications of the contract;
or
 - (5) Interferes with the Contractor's right to perform the terms and conditions of the contract.

- (c) All technical directions shall be issued in writing by the COR.
- (d) The Contractor shall proceed promptly with the performance of technical directions duly issued by the COR in the manner prescribed by this clause and within the authority under the provisions of this clause. If, in the opinion of the Contractor, any instruction or direction by the COR falls within one of the categories defined in (b)(1) through (5) above, the Contractor shall not proceed but shall notify the Contracting Officer in writing within five (5) working days after receipt of any such instruction or direction and shall request the Contracting Officer to modify the contract accordingly. Upon receiving the notification from the Contractor, the Contracting Officer shall:
 - (1) Advise the Contractor in writing within thirty (30) days after receipt of the Contractor's letter that the technical direction is within the scope of the contract effort and does not constitute a change under the "Changes" clause of the contract; or
 - (2) Advise the Contractor within a reasonable time that the Government will issue a written change order.
- (e) A failure of the Contractor and Contracting Officer to agree that the technical direction is within the scope of the contract, or a failure to agree upon the contract action to be taken with respect thereto shall be subject to the provisions of the clause entitled "Disputes - Alternate I".

H.3 MODIFICATION AUTHORITY (NOV 1997)

Notwithstanding any of the other provisions of this contract, the Contracting Officer shall be the only individual authorized to:

- (a) accept nonconforming work,
- (b) waive any requirement of this contract, or
- (c) modify any term or condition of this contract.

H.4 GOVERNMENT PROPERTY AND DATA - NONE (NOV 1997)

The Government is not obligated to furnish any real or personal property or data under this contract, and the Contractor is not authorized to acquire any real or personal property or data at the Government's expense under this contract.

H.5 GOVERNMENT PROPERTY AND DATA (JAN 1999)

- (a) Except as otherwise authorized by the Contracting Officer in writing, the Contractor is not authorized to acquire as a direct charge item under this contract any equipment (including office equipment), furniture, fixtures or other personal property items.
- (b) Acquisition Authorization Requirements

- (1) In the course of performance of this contract, the Contractor may only acquire and direct charge to this contract such items on the "List of Government Property -- Contractor Acquired" (Part III -- Section J, Attachment C) to this contract.
- (2) The Contractor may request authorization for acquisition of additional items from the Contracting Officer. Any such request shall include an analysis of the most economical method of acquisition (e.g., lease versus purchase) and shall describe the material equity arising from any proposed lease arrangement, such as option credits.
- (3) Any changes in the acquisition authorization shall be reflected in a modification to this contract which revises the "List of Government Property -- Contractor Acquired" (Part III -- Section J, Attachment C) to this contract.
- (4) Authorization to acquire does not constitute consent to the placement of a subcontract.

- (c) Government-Furnished Property and Data

Except as otherwise authorized by the Contracting Officer in writing, only that property and data specifically included in the "List of Government-Furnished Property" (Part III -- Section J, Attachment D) to the contract, shall be furnished.

- (d) Reporting Requirements

The reports required shall be submitted in accordance with 48 CFR 945 and the reporting requirements set forth in Part III, Section J, Attachment B.

The reports are to include all capital equipment and sensitive items acquired or furnished under this contract, whether or not listed on the attachments referenced above.

H.6 TITLE TO EQUIPMENT (GOVERNMENT) (APR 1998)

Pursuant to the clause of this contract entitled "Government Property (Cost-Reimbursement, Time-and-Materials, or Labor-Hour Contracts) --Alternate I," title to equipment having an acquisition cost of \$5,000 or more, purchased with funds available for research and approved by the Contracting Officer prior to acquisition, shall vest with the Government.

H.7 KEY PERSONNEL/PROGRAM MANAGER (MAR 1998)

The key personnel, which includes the Program Manager, specified below, are considered to be essential to the work being performed under this award; moreover, any changes to these personnel require prior DOE Contracting Officer's written approval.

The Program Manager shall serve as the Contractor's authorized supervisor for technical and administrative performance of all work hereunder. The Program Manager shall receive and execute, on behalf of the Contractor, such technical directions as the DOE Contracting Officer's Representative may issue within the terms and conditions of the contract.

The following is a list of key personnel that have been approved for this contract:

Name	Title
[]	[]

Prior to diverting any of the specified individuals, the Contractor shall notify the Contracting Officer not less than thirty (30) calendar days prior to the diversion or substitution of key personnel and shall submit a written justification (including qualifications of proposed substitutions) to permit evaluation. The proposed changes will be approved in writing at the sole discretion of the Contracting Officer, with concurrence of the Contracting Officer's Representative.

H.8 TRAVEL AND PER DIEM COSTS (FEB 1998)

Costs incurred by contractor personnel for travel, including costs of lodging, other subsistence, and incidental expenses, shall be considered to be reasonable and allowable only to the extent that they do not exceed the rates and amounts set by Subchapter I of Chapter 57 of Title 5, United States Code, or by the Administrator of General Services or the President (or his designee) pursuant to any revision of such subchapter; and are allowable pursuant to the "Allowable Cost and Payment" clause, FAR 52.216-7.

Foreign travel shall be subject to DEAR 952.247-70.

H.9 PRIOR APPROVAL REQUIREMENTS FOR PLACEMENT OF SUBCONTRACTS/CONSULTANTS (OCT 1998)

The Contractor shall obtain the Contracting Officer's written consent before placing any subcontract, including consultants, for which advance notification is required under FAR 52.244-2, "Subcontracts".

Any request for subcontract/consultant approval shall include the elements prescribed by FAR 52.244-2, including subcontractor/consultant Representations and Certifications. For consultants the Contractor will obtain and furnish information supporting the need for and selection of such consultant services and the reasonableness of the fees to be paid, including, but not limited to, whether fees to be paid to any consultant exceed the lowest fee charged by such consultants to others for performing consulting services of a similar nature.

Except as may be expressly set forth therein, any consent by the Contracting Officer to the placement of subcontracts and/or consultants shall not be construed to constitute approval of the subcontractor or any subcontract terms or conditions, determination of the allowability of any cost, revision of this contract or any of the respective obligations of the parties thereunder, or creation of any subcontractor privity of contract with the Government.

The Contractor is hereby given consent to the placement of the following subcontractors, which were evaluated during negotiations:

$$\begin{bmatrix} 1 & 0 & 0 \\ 0 & 1 & 0 \\ 0 & 0 & 1 \end{bmatrix}$$

Notwithstanding this consent, the Contractor shall ensure compliance with FAR 52.244-2. Also, since these subcontracts and/or consultants have as a purpose the conduct of research, development and demonstration work, they must additionally contain all applicable flow-down clauses contained in Part II, Section I.

H.10 SUBCONTRACTOR FACILITIES CAPITAL COST OF MONEY (FEB 1998)

- (a) To the extent a subcontractor proposes to recover as an element of proposed cost any Facilities Capital Cost of Money (FCCOM) from a higher tier subcontractor or from the prime contractor, the FCCOM cost principle (FAR 31.205-10) shall apply to subcontracts and new scope modifications issued thereto which are fee bearing cost reimbursement type or negotiated fixed price type.

- (b) To the extent a subcontractor is eligible to recover yet does not propose as an element or proposed cost any Facilities Capital Cost of Money (FCCOM) from a higher tier subcontractor or from the prime contractor, the higher tier subcontractor or the prime contractor shall insert the following provision in any such subcontract or new scope modification issued thereto:

Waiver of Facilities Capital Cost of Money
(FAR 52.215-17, OCT 1997)

The Contractor did not include facilities capital cost of money as a proposed cost of this contract. Therefore, it is an unallowable cost under this contract.

- (c) The Contractor agrees to insert the substance of this clause, including this paragraph (c) altered as necessary for proper identification of the parties, in any subcontract placed hereunder which is a fee bearing cost reimbursement or negotiated fixed price type.

H.11 CONFIDENTIALITY OF INFORMATION (MAY 1998)

To the extent that the work under this contract requires that the Contractor be given access to confidential or proprietary business, technical, or financial information belonging to the Government or other companies, the Contractor shall, after receipt thereof, treat such information as confidential and agree not to appropriate such information to its own use or to disclose such information to third parties unless specifically authorized by the Contracting Officer in writing. The foregoing obligations, however, shall not apply to:

- (a) Information which, at the time of receipt by the Contractor, is in the public domain;
- (b) Information which is published after receipt thereof by the Contractor or otherwise becomes part of the public domain through no fault of the Contractor;
- (c) Information which the Contractor can demonstrate was in his possession at the time of receipt thereof and was not acquired directly or indirectly from the Government or other companies;
- (d) Information which the Contractor can demonstrate was received by it from a third party who did not require the Contractor to hold it in confidence.

The Contractor shall obtain the written agreement, in a form satisfactory to the Contracting Officer, of each employee permitted access, whereby the employee agrees that he will not discuss, divulge or disclose any such information or data to any person or entity except those persons within the Contractor's organization directly concerned with the performance of the contract.

The Contractor agrees, if requested by the Government, to sign an agreement identical, in all material respects, to the provisions of this clause, with each company supplying information to the Contractor under this contract, and to supply a copy of such agreement to the Contracting Officer. From time to time upon request of the Contracting Officer, the Contractor shall supply the Government with reports itemizing information received as confidential or proprietary and setting forth the company or companies from which the Contractor received such information.

The Contractor agrees that upon request by DOE it will execute a DOE-approved agreement with any party whose facilities or proprietary data it is given access to or is furnished, restricting use and disclosure of the data or the information obtained from the facilities. Upon request by DOE, such an agreement shall also be signed by Contractor personnel.

This clause shall flow down to all subcontracts.

H.12 REPRESENTATIONS, CERTIFICATIONS AND OTHER STATEMENTS OF THE OFFEROR (JUNE 1998)

The Representations, Certifications and Other Statements of the Offeror for this contract are hereby incorporated by reference.

H.13 AUTOMATIC DATA PROCESSING EQUIPMENT (ADPE) USAGE (NOV 1997)

ADPE requirements which were not included in the Contractor's original proposal may not be acquired (leased or purchased) without the prior written consent of the Contracting Officer. Whenever Contracting Officer written consent is required, the Contractor will furnish to the Contracting Officer information concerning the need for and selection of such ADPE, the specific make(s) and model(s), and the lease versus purchase determination.

H.14 AUTOMATIC DATA PROCESSING EQUIPMENT (ADPE) LEASING (NOV 1997)

- (a) If the Contractor leases ADPE equipment for use under this contract, the Contractor shall include a provision in the rental contract stating that the Government shall have the unilateral right to exercise any purchase option under the rental contract between the Contractor and the ADPE equipment vendor and to realize any other benefits earned through rental payments.
- (b) The Contractor shall furnish a copy of the rental contract to the Contracting Officer under the terms of this provision.

H.15 INDIRECT COSTS (NOV 1997)

Pending establishment of final indirect cost rates for any period, billing and reimbursement of indirect costs shall be made on the basis of provisional rates recommended by the cognizant Government auditor. When a rate change occurs, and after it has been audited and approved by the cognizant Government auditor, the contractor shall inform the Contracting Officer by letter of the indirect rate change. This notification shall include a copy of the cognizant auditor's approval and the cost impact of the rate change on the program.

H.16 GUARANTEED FINAL REPORT (NOV 1997)

Notwithstanding the applicable cost principles of the Federal Acquisition Regulation (FAR) and the DOE Acquisition Regulation (DEAR) in effect on the date of this contract, and as authorized by Paragraph (a) of the clause of this contract entitled "Allowable Cost and Payment," the contractor agrees to manage this contract in such a manner so as to guarantee to the Government the delivery of an acceptable Final Report. It is the contractor's responsibility to ensure at all times that adequate funds remain to cover all allowable costs necessary for the preparation and delivery of the acceptable Final Report. All costs incurred by the contractor during preparation and delivery of the acceptable Final Report that are in excess of the funds remaining in the contract shall be borne by the contractor.

H.17 COMPLIANCE WITH APPLICABLE FEDERAL, STATE AND LOCAL REQUIREMENTS (FEB 1998)

In performing work under this contract, the Contractor shall comply with all relevant federal, state, and local statutes, ordinances, laws, and regulations.

H.18 NATIONAL ENVIRONMENTAL POLICY ACT (NEPA) -- PRIOR APPROVALS (JAN 2000)

The National Environmental Policy Act of 1969 (NEPA) requires that all Federal agencies consider the impacts of their projects on the human environment. As part of the DOE's NEPA requirements, the Contractor shall be required to supply to the DOE certain environmental information. DOE funds may only be expended by the Contractor on [ACTIVITIES THAT CAN BE PERFORMED UNTIL THE NEPA DOCUMENT IS SIGNED] activities, until DOE notifies the Contractor that all NEPA requirements have been satisfied.

H.19 CONTRACTOR PRESS RELEASES (APR 1998)

The DOE policy and procedure on news releases requires that all Contractor press releases be reviewed and approved by DOE prior to issuance. Therefore, the Contractor shall, at least ten (10) days prior to the planned issue date, submit a draft copy to the Contracting Officer of any planned press releases related to work performed under this contract. The Contracting Officer will then obtain necessary reviews and clearances and provide the Contractor with the results of such reviews prior to the planned issue date.

H.20 PERMITS AND LICENSES (JAN 1999)

Within sixty (60) days of award, the Contractor shall submit to the DOE Contracting Officer Representative (COR) a list of ES&H approvals that, in the Contractor's opinion, shall be required to complete the work under this award. This list shall include the topic of the approval being sought, the approving authority, and the expected submit/approval schedule. The COR shall be notified as specific items are added or removed from the list and processed through their approval cycles.

The Contractor agrees to include this clause in their first-tier subcontracts and agrees to enforce the terms of this clause.

H.21 QUALITY ASSURANCE/QUALITY CONTROL (JUNE 1998)

The Contractor shall implement the DOE work using Quality Assurance/Quality Control measures as appropriate to:

- (a) Achieve accuracy, precision, and reproducibility of data adequate to fulfill the objectives of the work to be performed under this award;
- (b) Control experimental operations using accepted technical standards, instruction, and other appropriate means commensurate with the complexity and the risk of the work;
- (c) Identify, control and maintain components, equipment, facilities, hardware and materials;
- (d) Control handling, storage, shipping. Cleaning and preservation to prevent damage, loss or deterioration;
- (e) Control calibration, maintenance, accountability, and use of measuring and testing equipment used for monitoring and data collection;

- (f) Ensure that designs use sound engineering/scientific principles and appropriate standards and demonstrate that equipment and processes performed as intended;
- (g) Ensure that purchased items and services meet established specifications and requirements;
- (h) Incorporate inspections as appropriate;
- (i) Continually improve the quality of the work done for DOE through the improvement of work practices guided by internal performance assessment.

H.22 SAFETY & HEALTH AND ENVIRONMENTAL PROTECTION (JUNE 1998)

- (a) The Contractor shall implement the DOE work in accordance with all applicable Federal, State and local law as, including codes, ordinances and regulations, covering safety, health and environmental protection.
- (b) The Contractor agrees to include paragraph (a) of this clause in first-tier subcontracts and agrees to enforce the terms of this clause.

H.23 CONTRACTOR LICENSING (APR 1998)

- (a) Limited Rights Data Or Restricted Computer Software

Except as may be otherwise specified in this contract as data not subject to this paragraph, the contractor agrees that upon written application by DOE, it will grant to the Government for purposes of practicing [], by or for the Government for the purpose of remediation or decontamination of chemically contaminated or radioactive sites, a nonexclusive license in any limited rights data or restricted computer software on terms and conditions reasonable under the circumstances including appropriate provisions for confidentiality; provided, however, the contractor shall not be obligated to license any such data or software if the contractor demonstrates to the satisfaction of the Director of Environmental and Waste Management or designee that such data are being supplied by the contractor or its licensees in sufficient quantity and at reasonable prices to satisfy DOE needs, or the contractor or its licensees have taken effective steps to so supply such data in the form of results obtained by its use.

(b) Background Patents

"Background Patent" means a domestic patent covering an invention or discovery which is not a subject invention and which is owned or controlled by the contractor at any time through the completion of this contract, infringement of which cannot reasonably be avoided upon the practice of any specific process, method, machine, manufacture or composition of matter (including relatively minor modifications thereof) which is a subject of the research, development, or demonstration work performed under this contract.

The contractor agrees that upon written application by DOE, it will grant to the Government for purposes of practicing [] by or for the Government for the purpose of remediation or decontamination of chemically contaminated or radioactive sites, nonexclusive license(s) under any background patent on terms that are reasonable under the circumstances. If, however, the contractor believes that exclusive or partially exclusive rights are necessary to achieve expeditious commercial development or utilization, then a request may be made to the Director of Environmental and Waste Management or designee for approval of such licensing by the contractor. Notwithstanding the foregoing, the contractor shall not be obligated to license any background patent if the contractor demonstrates to the satisfaction of the Director of Environmental Restoration and Waste Management or designee that the contractor or its licensees are supplying the subject matter covered by said background patent in sufficient quantity and at reasonable prices to satisfy DOE needs, or have taken effective steps or within a reasonable time are expected to take effective steps to so supply the subject matter.

(c) Licensing Intellectual Property for Performing the Contract

The contractor also agrees and does hereby grant to the Government a royalty-free, non-exclusive license under any background patent or to any limited rights or restricted computer software for purposes of practicing a subject of this contract by or for the Government in research, development, or demonstration under this contract.

H.24 RIGHTS IN TECHNICAL DATA (EM-DELIVERY) (SEPT 1999)

Delivery of limited rights data. The Contractor shall, at the option of the Contracting Officer, be required to deliver any limited rights data used in the performance of this contract. Such data shall be subject to the provision of clause FAR 52.227-14, Rights in Data--General with Alternatives II and V, paragraph (g), "Protection of limited rights data and restricted computer software," and to the "Contractor Licensing" provisions in this Section H.

1. The limited rights data subject to clause FAR 52.227-14 are listed below **[OR in Attachment () attached hereto and made a part hereof]**. This listing of data, which are asserted by the Contractor to be limited rights data, does not constitute an admission by the Government that the data is in fact limited rights data.

[CONTRACTOR TO IDENTIFY/CERTIFY SPECIFIC DATA ASSERTED TO BE PROPRIETARY (STATEMENT FROM CONTRACTOR)]

[_____

_____]

2. Subject to clause FAR 52.227-14 paragraph (g)(2), any limited rights data so delivered shall be marked with the appropriate "Limited Rights Notice."
3. The Contractor shall not introduce or utilize any limited rights data not identified in (1) above without advance written notification of the Contracting Officer.

Minimum technical data deliverable with unlimited rights. Notwithstanding any other provision of this Contract, the following technical data first produced under this Contract as a minimum, shall be delivered to the DOE with unlimited rights:

[THE COR WILL SPECIFY WHAT DATA DOE WANTS TO HAVE DELIVERED WITH UNLIMITED RIGHTS]

H.25 RIGHTS IN TECHNICAL DATA (EM-INSPECTION) (SEPT 1999)

Withholding of limited rights data. Notwithstanding the inclusion of clause FAR 52.227-16, Additional Technical Data Requirements, in this Contract or any provision of this Contract specifying the delivery of technical data, the Contractor may withhold limited rights data from delivery, provided that the Contractor furnishes in lieu of any such limited rights data so withheld technical data disclosing the source, size, configuration, mating and attachment characteristics, functional characteristics, and performance requirements ("Form, Fit and Function" data, e.g., specification control drawing, catalog sheets, envelope drawings, etc.), or a general description of such limited rights data where "Form, Fit and Function" data are not applicable. Such data shall be subject to the provision of clause FAR 52.227-14, Rights in Data--General with Alternative V, paragraph (j), "Inspection rights," and paragraph (g), "Protection of limited rights data and restricted computer software," and to the "Contractor Licensing" provisions in Section H.

1. The limited rights data subject to clause FAR 52.227-14 are listed below **[OR in Attachment () attached hereto and made a part hereof]**. This listing of data, which are asserted by the Contractor to be limited rights data, does not constitute an admission by the Government that the data is in fact limited rights data.

**[CONTRACTOR TO IDENTIFY/CERTIFY SPECIFIC DATA ASSERTED
TO BE PROPRIETARY (STATEMENT FROM CONTRACTOR)]**

[_____

_____]

2. Subject to clause FAR 52.227-14 paragraph (j), any limited rights data specifically used in the performance of this Contract shall, at the option of the Contracting Officer, be available for inspection by a designee of the Contracting Officer at the project facility.
3. The Contractor shall not introduce or utilize any limited rights data not identified in paragraph (1) above in the performance of the contract work without the expressed written permission of the Contracting Officer.

Minimum technical data deliverable with unlimited rights. Notwithstanding any other provision of this Contract, the following technical data first produced under this Contract as a minimum, shall be delivered to the DOE with unlimited rights:

**[THE COR WILL SPECIFY WHAT DATA DOE WANTS TO HAVE
DELIVERED WITH UNLIMITED RIGHTS]**

H.26 RESTRICTED COMPUTER SOFTWARE (EM-DELIVERY) (SEPT 1999)

The restricted computer software subject to the provisions of clause FAR 52.227-14, Rights in Data--General with Alternatives III and V, paragraph (g), and to the provisions of the clause entitled "Contractor Licensing," are listed below. This list of software programs, which are asserted by the Contractor to be restricted computer software, does not constitute an admission by the Government that the software is in fact restricted computer software.

**[CONTRACTOR TO IDENTIFY/CERTIFY SPECIFIC SOFTWARE
ASSERTED TO BE PROPRIETARY (STATEMENT FROM
CONTRACTOR)]**

[_____]

Subject to clause FAR 52.227-14 paragraph (g)(3), any restricted computer software specifically used in the performance of this Contract shall, at the option of the Contracting Officer, be delivered to the Government. Any restricted computer software so delivered shall be marked with the "Restricted Rights Notice" provided in clause FAR 52.227-14 paragraph (g)(3).

The Contractor shall not introduce or utilize any restricted computer software not identified above without advance written notification of the Contracting Officer.

H.27 RESTRICTED COMPUTER SOFTWARE (EM-INSPECTION) (SEPT 1999)

The restricted computer software subject to the provisions of clause FAR 52.227-14, Rights in Data--General with Alternative V, paragraphs (j) and (g), and to the provisions of the clause entitled "Contractor Licensing", are listed below. This list of software programs, which are asserted by the Contractor to be restricted computer software, does not constitute an admission by the Government that the software is in fact restricted computer software.

**[CONTRACTOR TO IDENTIFY/CERTIFY SPECIFIC SOFTWARE
ASSERTED TO BE PROPRIETARY (STATEMENT FROM
CONTRACTOR)]**

[_____]

Subject to clause FAR 52.227-14 paragraph (j), any restricted computer software specifically used in the performance of this Contract shall, at the option of the Contracting Officer, be available for inspection by a designee of the Contracting Officer at the project facility.

The Contractor shall not introduce or utilize any restricted computer software not identified above without advance written notification of the Contracting Officer.

H.28 YEAR 2000 COMPLIANCE (APR 1998)

Year 2000 compliant means, with respect to information technology, the information technology accurately processes date/time data (including, but not limited to, calculating, comparing, and sequencing) from, into, and between the twentieth and twenty-first centuries, and the years 1999 and 2000 and leap year calculations, to the extent that other information technology being acquired, properly exchanges date/time data with it.

The contractor assures, by acceptance of this award, that any items delivered under this contract are year 2000 compliant.

H.29 LOBBYING RESTRICTION (ENERGY & WATER DEVELOPMENT APPROPRIATIONS ACT, 2000) (DEC 1999)

The contractor agrees that none of the funds obligated on this award shall be expended, directly or indirectly, to influence congressional action on any legislation or appropriation matters pending before Congress, other than to communicate to Members of Congress as described in 18 U.S.C. 1913. This restriction is in addition to those prescribed elsewhere in statute and regulation.

A copy of the DOE “Lobbying Brochure” which provides a summary of the statutory and regulatory restrictions regarding lobbying activities for Federal contractors can be found at (<http://www.pr.doe.gov/lobbying.html>)

H.30 NOTICE REGARDING THE PURCHASE OF AMERICAN-MADE EQUIPMENT AND PRODUCTS -- SENSE OF CONGRESS (DEC 1999)

It is the sense of the Congress that, to the greatest extent practicable, all equipment and products purchased with funds made available under this award should be American-made.

H.31 MULTIPLE AWARDS -- PHASED ACQUISITIONS (APR 1989)

A determination by the Contracting Officer to continue into subsequent phases will be restricted to the current phase contractor(s). The determination to select the contractor(s) for a succeeding phase(s) will be on a competitive down selection process occurring at the completion of Phases (I, II, etc.) based on the contractor's progress in the current phase, evaluation of the technical approach for planned activities for the upcoming phase, and availability of funds.

The contractor shall submit a comprehensive report at least 60 days prior to completion of the current phase, which shall as a minimum describe the actual and projected accomplishments in the current phase, including schedule and costs, and provide a detailed technical proposal, including schedule and costs for the upcoming phase. Furthermore, the contractor is cautioned that late proposals, modifications, and withdrawals will be treated in accordance with FAR 52.215-10. To aid in the evaluation, the report shall be clearly and concisely written as well as being neat, indexed, and logically assembled in accordance with Article H.32. In the event the Government makes a determination to continue into a subsequent phase(s), a bilateral contract modification will be issued in accordance with Article B.8.

The following technical evaluation criteria and program policy factors will be applied in the determination to continuation into a subsequent phase(s):

A. Technical Proposal Evaluation Criteria

Criterion 1 -- Understanding of Objectives and DOE Needs (35%)

Proposals will be evaluated considering the offeror's understanding of the Department of Energy (DOE) subsurface Contaminants need(s) or problem(s) being addressed.

- (a) Soundness of the offeror's understanding of the overall PRDA objectives, and of the issues, needs, and problems defined in the proposed research area; understanding, extent of knowledge, and completeness and accuracy of comparison of current technologies if available, with the proposed technology; understanding of potential advantages, benefits and improvements of the proposed technology over current, commercial, and emerging technologies; and, understanding of deficiencies of current technologies and feasibility of offeror's technology to overcome the deficiencies.
- (b) Applicability of the proposed technology to one or more DOE sites; and understanding of the site characteristics necessary or desirable for use of the proposed technology.

- (c) Extent of prior use, research, development or application of the proposed technology and appropriateness of how the prior work relates to the proposed application of the technology.

Criterion 2 -- Technical Approach (35%)

- (a) Completeness and appropriateness of discussion regarding potential technical, regulatory, environmental, economic, production or other issues to be addressed by the technical approach; soundness of scientific and engineering rationale; applicability of the proposed technology to the proposed research area; soundness and completeness of the Statement of Work (SOW) and technical approach for all phases; appropriateness and clarity of success criteria; and soundness and completeness of preliminary test plan. Identification of potential issues and proposed resolution of the issues for the development of the technology.
- (b) Reasonableness and appropriateness of schedule, milestones, proposed labor hours, labor categories, travel, consultants, and subcontractors.
- (c) Extent of available environmental information on the technical approach and project site(s); and significance of potential environmental, safety, and health impacts.

Criterion 3. -- Capabilities, Commitment, and Organizational Experience (20%)

- (a) Extent and appropriateness of qualifications, and technical and managerial experience of the proposed personnel, subcontractors, and consultants; capabilities of project organization including technical knowledge, access to financial and technical resources, and project management abilities; and prior experience in managing projects similar in type, technology, size and complexity; and prior experience in obtaining permits and licenses and in dealing with environmental laws and regulations. If work requiring radioactive or hazardous material training is required, address the status of such training for the appropriate personnel.
- (b) Motivation of organization for being involved in proposed effort; priority of proposed effort relative to other commitments; commitment to deployment and commercialization and completeness and soundness of commercialization plan; and extent of existing licenses, patents, royalties, or intellectual property rights of the proposed technology.

- (c) Soundness and completeness of project organizational structure; identification of key personnel's functions and responsibilities; and availability and time commitments of proposed personnel.

Criterion 4 -- Facilities and Equipment (10%)

Proposals will be evaluated considering the completeness, appropriateness and availability of proposed equipment, materials, and facilities; reasonableness of justification for purchase or lease of facilities, equipment, or materials; and, extent of existing permits and licenses related to operation of facilities. This evaluation will include whether the proposed facilities have the appropriate permits in place to work with the materials of concern in the proposed work.

The evaluation of proposals at the conclusion of each Phase will be conducted using preestablished weights to determine the relative merits of the contractor's proposal in accordance with the technical evaluation criteria.

B. Program Policy Factors.

These factors, while not indicators of the proposal's merit, e.g., technical excellence, cost, proposer's ability, etc., may be essential to the process of selecting the proposal(s) that, individually or collectively, will best achieve the program objectives. Such factors are often beyond the control of the offeror. Proposers should recognize that some very good proposals may not receive an award because they do not fit within a mix of projects which maximizes the probability of achieving the DOE's overall research and development objectives. Therefore, the following Program Policy Factors may be used by the Source Selection Official to assist in determining which of the ranked proposal(s) shall receive DOE funding support.

- It may be desirable to select project(s) for award of less technical merit than other project(s) if such a selection will optimize use of available funds, and distribute funds and projects among a larger number of research areas.
- It may be desirable to select project(s) for award which initiate work at higher maturity Gate levels and exhibit higher potential for expedient implementation.
- It may be desirable to select project(s) for award which will be applicable to multiple DOE sites.
- It may be desirable to select project(s) for award that represent a diversity of methods, approaches, or application of differing technology options.

- It may be desirable to select project(s) for award which minimize issues regarding siting, environmental permitting and the impact of regulatory issues.
- It may be desirable to select project(s) for award which represent a diversity of organizations (i.e., small businesses, educational institutions).
- It may be desirable to select project(s) for award which maximize the return on investment of previous Government funding.

H.32 COMPREHENSIVE REPORT -- PHASED ACQUISITIONS

A.. General

The overall comprehensive proposal shall consist of three(3) physically separate volumes, individually entitled as stated below. The required number of each proposal volume is shown below.

Proposal Volume -- Title	Original (Copy #1)	Additional Copies Required	
		Paper Copy	Electronic Copy
Volume I - Topical Report	1	5	1
Volume II -- Technical Proposal	1	5	1
Volume III -- Cost Proposal	1	5	N/A

B. Topical Report

The contractor shall submit a comprehensive report summarizing the actual accomplishments completed in the current phase, including schedules, milestones, and costs.

C. Technical Proposal

1. Volume II -- Technical Proposal addressing the technical and management aspects of the upcoming phase, and his capabilities and what he will do to satisfy the requirements of the Statement of Work. Since the Technical Proposal will be evaluated to determine such matters as understanding of the work to be performed, technical approach, scientific and technical innovation, and potential for completing the desired work it should be specific and complete in every detail.

2. In order that the Technical Proposal may be evaluated strictly on the merit of the material submitted, no contractual cost information is to be included in the Technical Proposal. Where estimated man-hours will provide clarity, they shall be quoted in man-hour figures only, with no indication as to the cost of these man-hours.
3. The expected project results reflect the problems and objective of the program under consideration; therefore, repeating the scope of work without sufficient elaboration will not be acceptable.
4. The Technical Proposal shall not exceed 30 pages. For interpretation of page guidelines, the front and back of a single sheet are counted as two pages.
5. Format and Content. This volume shall include the following components
 - a. Cover Page.
 - b. Table of Contents.
 - c. Technical Summary. This short one (1) page section should outline the Contractor's proposed general approach for the upcoming Phase . The summary shall contain how the Contractor plans on completing the proposed Statement of Work for the upcoming phase, and shall outline the overall technical aspects of the proposed development effort.
 - d. Technical Discussion. This section shall contain the major portion of the Technical Proposal for the upcoming phase. It should be presented in as much detail as practical based on the guidelines provided for Initial Phase work.

For Facilities:

The Contractor shall furnish a list of materials, parts, and equipment required for the project. The Contractor shall discuss the type, quality, and availability of the equipment, materials, and facilities. The Contractor shall justify the purchase or lease of facilities, equipment, and materials. This data shall also be related to the tasks under which the equipment is required and the schedule time frame in which such equipment is required. The Contractor shall describe any unique features of the equipment and facilities.

D. Cost Proposal

1. The Cost Proposal, Volume III, consists of the Contractor's estimated costs to perform the upcoming phase. Contractual cost information is not to be included in the Technical Proposal, Volume II.
2. Major Subcontracts (Including Intercompany Transfers): For each subcontract requiring Certified Cost and Pricing Data, cost information shall be required and furnished in the same format and level of detail as prescribed for the Contractor. Furnish reasons for any differences in the amount proposed by the Contractor to the Government for the subcontracted work.
3. Joint Ventures/Teaming Arrangements: If a joint venture or teaming arrangement is contemplated, the participants shall clearly identify which cost element(s) pertain to what participant.
4. High-Value Equipment: Contractors are informed that when the use of High Value Equipment (in excess of \$10,000) is applied to this acquisition, the Government reserves the right to require the submission of the feasibility of lease versus purchase studies by the Contractor.
5. Use of ADPE: If the use of automatic data processing equipment (ADPE) is contemplated, the Government reserves the right to require the preparation of (a) feasibility and (b) lease versus purchase studies by the Contractor.
6. Certified Cost or Pricing Data. Contractors may be required to certify (in accordance with Pub. L. 87653 as implemented by FAR 15.804) that any cost or pricing data submitted is accurate, complete and current. In such an event, the required format for the certification can be found in FAR 15.804-4. The executed certification must be presented to the Contracting Officer after negotiations are concluded and before award modification can be made. FAR 15.804-7 contains applicable procedures where it is subsequently found that defective cost or pricing data was submitted.

Any Contractor required to submit the above certification shall be required (in accordance with FAR 15.804-2) to submit, or arrange for the submission of, accurate, complete, and current cost or pricing data from his prospective subcontractors. This requirement may be waived under the circumstances set forth in FAR 15.804-3.

Notwithstanding the above paragraphs, the Contractor shall comply with applicable requirements of the "Subcontractor Cost or Pricing Data", or "Subcontractor Cost and Pricing Data -- Modifications" clauses of the awarded contract.

7. Format and Contents. The cost proposal shall include two sections: Section One - Mandatory Exhibits and Section Two - Additional Information.

a. Preparation of Section One - Mandatory Exhibits:

Exhibit A: SF-1411s are mandatory requirements. One fully executed SF-1411 shall be completed for the upcoming phase utilizing the following format:

<u>Cost Element</u>	<u>Task Number</u>			<u>Total</u>
	1	2	3	
Direct Labor	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Labor Overhead	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Travel	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Printing/Reproduction	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Freight/Postage	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Expendable Materials	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Subcontracts/Consultants	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Equipment	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Other	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Subtotal	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
General & Administrative	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx
Total Cost	\$xxxxx	\$xxxxx	\$xxxxx	\$xxxxx

Exhibit B - Labor: Direct Labor shall be supported by a matrix identifying labor categories, hours proposed, hourly rate and cost on a per-task for the upcoming phase.

Exhibit C - Escalation: This Exhibit shall contain by cost element, the effective annual escalation rate each Contractor expects to experience during the performance of the upcoming phase.

Exhibit D - Indirect Rates: This Exhibit will contain the major base and pool expense groupings by line item and dollar amount. This Exhibit shall be prepared for the Contractor's most recently completed Fiscal Year, the current Fiscal Year, and the estimate for the next Fiscal Year. The Contractor shall state at the bottom of the exhibit the inclusive dates of their Fiscal Year. The Contractor may substitute a Government approved written indirect rate agreement if such agreement contains rates that cover the period of performance.

Exhibit E - Travel/Other Direct Costs/Materials: This Exhibit shall contain itemized listings and justifications for any other direct costs such as travel, freight, materials, etc. **Travel** shall be supported by a matrix identifying number of trips, locations to be visited, number of persons traveling, transportation cost, per diem cost, and total cost. For pricing purposes, Contractors should assume that the briefings required under the SOW will be conducted at NETL-Morgantown. **Printing/ Reproduction** cost may be identified as a flat amount on a per-task basis. **Freight/Postage** cost may be identified as a flat rate on a per-task basis. **Expendable Materials** must be supported by identifying the materials to be consumed, the unit cost and the number of units to be used.

Exhibit F - Property: This exhibit shall detail the property (equipment) to be purchased or furnished. **Equipment** must be supported by identifying the item(s), the unit cost, and the total cost. If your proposal is based on the use of Government furnished property (GFP), provide a list of those items on this exhibit and show how their use increases or decreases the cost of the upcoming phase, also state how the property is being acquired, from whom and how it will be used during the upcoming phase.

Exhibit G - Subcontracts: This exhibit shall detail all subcontract and consultant costs.

Subcontracts/Consultants must be supported in the same level of detail as the contract, on a task-by-task and total basis.

Additional documentation is required by the DOE for subcontracts in excess \$25,000:

- (1) A brief description of the work to be subcontracted.
- (2) Names and addresses of the subcontractors tentatively selected and basis, i.e., low bidder, delivery schedule, technical competence, etc.
- (3) The number of quotes solicited and received, i.e. extent of competition.
- (4) A rating of the subcontractor's competence (fair, good, excellent).
- (5) Type of contract and estimated cost and fee or profit.
- (6) Affiliation with Contractor, if any.
- (7) Whether or not subcontractor is a small business concern or a minority business concern.

Consultants: If the Contractor proposes the use of named consultants, provide the following:

- (1) Resume.
- (2) Details regarding the proposed rate and its reasonability, and justification for selecting the consultant.
- (3) Details of what cost elements are included in the rate, and what costs would be charged over and above the rate.
- (4) A signed statement from the consultant that the rate is a "Most Favored Customer Rate," or the reason it was not offered.
- (5) A rate comparison which details that the rate proposed is comparable to the rates of other consultants doing similar types of work.
- (6) The Contractor shall prepare a technical evaluation of the need to employ a consultant, which shall include the consultant's technical ability to perform the desired work, along with a statement to the effect that in-house resources are unavailable for performance of the effort.
- (7) A signed consulting agreement.
- (8) An invoice substantiating the proposed rate and confirmation of payment.

b. Preparation of Section Two, Additional Information.

Estimating Procedure. Include a discussion of the rationale used in estimating the various cost elements. For effective negotiations, it is essential that there be a clear understanding of:

- (1) The existing verifiable data;
- (2) The judgmental factors applied in projecting from known data to the estimate;
- (3) The contingencies used in the proposed costs for Phase II.

NOTE: The contractor shall not proceed with Phase II activity without written Contracting Officer approval.

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B	Reporting Requirements (Pages B.1 thru B.22)	J.2 - B.1
C	List of Government Property/Contractor Acquired	J.3 - C.1
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E	Small, Small Disadvantaged and Women-Owned Business Subcontracting Plan (Pages E.1 Thru E.6)	J.5 - E.1
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G	Intent to Propose	J.7 - G.1
H	Cost Proposal Preparation Instructions/Format (Pages H.1 thru H.23)	J.8 - H.1
I	Instructions For Preparing the Statement of Work (Pages I.1 thru I.4)	J.9 - I.1

ATTACHMENT A

STATEMENT OF PROGRAM OBJECTIVES

STATEMENT OF PROGRAM OBJECTIVES

“Development of Innovative and Improved Technologies for Subsurface Contaminants”

A. Objective:

The objective of the procurement is to expedite applied research, development and demonstration of innovative and improved technologies to meet the needs in the area of subsurface contaminants. Three research areas are anticipated in the Program Research and Development Announcement (PRDA). The research areas are (1) characterizing, monitoring, modeling and Analysis, (2) separations and reactive treatments in the subsurface, and (3) validation, verification, and long-term monitoring of contaminants and treatment.

B. Background and General Information:

The Department of Energy, National Energy Technology Laboratory on behalf of the Office of Environmental Management (EM), Office of Science and Technology (OST), Subsurface Contaminants Focus Area (SCFA) is seeking an innovative and improved technologies that will reduce the cost of, or time to remediate subsurface contaminants found in the Department of Energy (DOE) complex. It is the expectation of this Program Research and Development Announcement (PRDA), that the technologies will require applied research, development that should yield within three years a solution to a DOE technology need which is ready for field-scale demonstration or actual deployment.

The focus of this solicitation is for research in the intermediate stages of the technology development cycle, as defined by Office of Science and Technology (OST) in its documents “Interim Guidance, Office of Science and Technology, Technology Decision Process, May 8, 1997” and “Tracking Technology Maturity in DOE’s Environmental Management Science and Technology Program” (attachment A). These intermediate stages are - Applied Research, - Exploratory Development, and - Advanced Development, defined as Stages 2, 3, and 4 respectively. Proposals with a start point in any of these three stages of development may be selected, but depending on the starting stage, the performance expectations will be somewhat different as identified below:

Included activities in - Applied Research are:

- Proof of principle and laboratory-scale experimentation (i.e., Technical Merit)
- Comparison to baseline (technical and economic) is initiated.
- Technical link to end user need
- Initiate identification of DOE end user(s) who is committed to deploy technology

Included activities in - Exploratory Development are (Applied Research requirements must also be met):

- Laboratory scale prototyping
- Refined technical and cost comparison to user need
- Estimation of life cycle cost
- Identification of functional performance requirements and operational concepts.
- Technology user commitment to strongly support and deploy the product
- Initiation of Environmental, Safety and Health (ES&H) risk identification and plan to address it.
- Begin addressing regulatory & stakeholder issues, which would affect deployment of technology

Activities included under - Advanced Development are (Exploratory Development requirements must also be met):

- Full-scale laboratory testing
- Preliminary field testing (demonstration at a DOE site)
- Refinement of technical specifications
- Infrastructure development plans.

While the research proposed must begin in the applied research or early development stages of the OST defined technology decision (Stages 2, 3, or 4), it is requested that the offeror include as additional optional phases continuation of the development into engineering development and demonstration. These are stages 5 and 6 as defined by the OST technology decision process.

Activities included in Engineering Development would include the systematic use of the knowledge gained from research and development to develop a detailed approach for full-scale design. This could include the production of drawings, schematics, computer codes, etc.; construction of prototype or pilot-scale units, system evaluation, reliability testing, infrastructure plans, and procurement specifications.

Activities included in Demonstration would include activities to affect a “real world” demonstration at a DOE site, using actual or simulated waste streams and/or anticipated operating conditions to verify assumptions made to this point and to ready the technology for deployment.

The proposed project should be configured into separate phases based on the Stage/Gate process already mentioned. The Phased Acquisition Process will be used for project selection. The initial DOE commitment will be for the first phase of the research effort. Continuation to subsequent phases will be dependent on technology development progress, continuation of the need for the technology, and availability of funding. Following the completion of the initial phase and all subsequent phases of the project, DOE will make use of the OST Technology Decision Process (reference appendix A) as one mechanism to evaluate the progress of selected projects and as an aide in the decision on continuation to following phases. This review process assists the sponsoring program in evaluating

the project's performance in achieving performance goals for the R&D effort as specified in reference A. Following specific stages in the technology decision process, the technology decision process incorporates the use of independent peer reviews. OST has selected to use the Institute for Regulatory Science/American Society of Mechanical Engineers (RSI/ASME) to perform the peer reviews. The independent peer review process is described in "Implementation Guidance for the Technical Review Process" (reference appendix B). The contractor/grantee will participate in all gate/peer reviews as described in Appendixes A and B. The information gained in each phase, including life cycle technology development cost, as elucidated in the phase report and gate/peer reviews can be used to refine the subsequent phase proposal as mutually agreed upon by DOE and the contractor/grantee. If a no continuation decision is reached a lessons learned report will be generated which summarizes the technical and economic findings up to that stage of technology development.

If the technology(s) proposed is at a level of maturity greater than either the Applied Research or Exploratory Development stage, documentation in sufficient detail is required in the proposal for DOE to make a determination of the level of maturity (See attachment A for description of the gate process).

If tests are conducted on hazardous material/waste, the proposer is responsible to follow all laws, rules and regulations from Federal, State or local governments on the acquisition, handling and disposal of this material. The cost of this activity must be clearly identified in the proposal. If the hazardous material/waste comes from a DOE site, the proposer must also comply with all DOE orders and regulations dealing with this material as well as following the procedures used by either the M&O or M&I contractor(s) managing that site.

The verification of the performance of either lab or field tests are a vital and significant requirement of technology development. Universally accepted standards for performance verification must be employed for all tests/demonstrations. The report generated, at the end of each technology stage, must fully describe the performance of the technology and include the verification methods and standards used, and data analysis for the Gate reviews

For field test/demonstrations to be performed at a DOE site there should be a documentation of the level of the interest or agreement between the offeror and the proposed site to perform the activity. The level of commitment of the host site will be an evaluation factor both in initial selection and in a project continuation evaluations. Prior to starting of a Phase of the contract which includes a field test or demonstration, a memorandum/letter of agreement between the offeror, the DOE host site and host site M&O/M&I contractor must be approved and submitted to the DOE-COR. The memorandum documents the agreement between offeror and a host site that a test/demonstration of the technology will be conducted and should outline the specific activities that will be performed by both parties. This activity should be closely coordinated with the DOE-COR and host site personnel before initiating any action.

A project management plan developed by the proposer, and approved by the DOE-COR and host site and its M&O/M&I contractor, must be in place before a test/demonstration deployment can occur at a DOE site. This plan must clearly delineate who has responsibilities for all activities involved with the deployment at DOE site (i.e., health and safety, site support, utilities, industrial hygiene/radiation protection, bulk material, subcontracts, storage and disposal of investigative derived waste, mobilization/demobilization, etc.) and the cost that are involved. This activity should be closely coordinated with the DOE-COR and should not be initiated until they are notified.

If the technology is demonstrated at an actual DOE hazardous waste site, an Innovative Technology Summary Report (ITSR) must be developed using the performance verification data gathered in the demonstration and earlier project phases. Guidance on how to develop the ITSR is included in attachment D. Please note that a critical element in this document is the cost savings estimate, which will be required of the offeror. The offeror is expected to address questions concerning the ITSR and the data used to develop it.

Since this PRDA addresses technologies which deal with potentially hazardous and radioactive material and waste, the proposer must submit evidence that they are certified to work with this material and have past experience.

The proposed technology must address a DOE environmental restoration need. The Needs statements identified by DOE sites and listed in the following Table below can be found within OST's Needs Management System (NMS). The NMS is a database maintained by OST and the sites and located at <http://em-needs.em.doe.gov/entry.asp>.

The following table provides information on the technology areas for which research activities are being sought and technology needs in the OST NMS database which would be addressed. Also listed are applicable projects within the OST Environmental Management Science Program (EMSP). The EMSP projects listed have conducted basic research that address some of problems identified by these needs. They are provided for the prospective offeror's consideration for teaming purposes. Please note this is a partial list of related EMSP projects and should not exclude other EMSP projects. Information on all EMSP projects can be located at <http://emsp.em.doe.gov>. However, it must be stressed that teaming with current EMSP participants is not required and new research approaches are encouraged. All proposals will be evaluated against the same criteria in the selection process. This is not a continuation of the EMSP.

Technology Area	Reference: NMS Associated Needs	Reference: EMSP Related Research
1 (a) In Situ Groundwater Characterization	RF-ER14, RL-SS09, RL-SS08, RL-SS05, OK99-01, NV01-0001-01S, OK99-21, RL-SS06.	54908, 70052, 55216, 70179, 54639, 70010
1 (b) Soil Characterization	RL-SS26, OH-F004, ID-6.1.01, OH-AB-012, OH-AB-008	70052, 55216, 70010
1 (c) Characterizing Physical, Chemical, and Biological Heterogeneity	RL-SS31, RL-WT013, RL-WT026, RL-SS36	54741, 54823, 55011, 55218, 55249, 55284, 60015, 70012, 70035, 70045, 70050, 70070, 70081, 70121, 70126, 70135, 70146, 70163, 70177, 70206, 70219, 70220, 70267
2 (a) In-Situ Reactive Treatment Barrier Materials	CH-SS01-99, OH-WV-911, ORHG-15, ORHY-12, RL-SS07, RL-SS04	54724, 55012, 55071, 55185, 70054, 55395, 70045, 70035, 55061
2 (b) Mobilization/Releasing Agents for Enhancement of Removal of Contaminants from Subsurface Hot Spots or Source Areas	AL-00-01-01-SC-2, CH-SS03-99, RF-ER09, ORBW-13	55036, 54791, 55014, 55164,
2 (c) In-Situ Chemical Stabilization of Subsurface Contaminants	ID-6.1.31, RF-ER09, AI-08-01-16-SC, ch-ss06-99, ORBW-01	55396, 54548, 54790, 55014, 70081
3 (a) Long-Term Monitoring	CH-SS04-99, OH-M907, OH-F050, OH-F051, ORHY-21, ORBW-08, RL-DD052, AL-07-09-02-SC, AL-09-02-01-SC, AL-00-01-04-SC, NV12-0001-06, OH-F048, SR00-3025, SR00-3027	54800, 54864, 55205, 55247, 60040, 70010, 70050, 70149, 70179, 55083, 54628
3 (b) Monitored Natural Attenuation	AL-09-02-04-SC, SR00-3026	54655, 54681, 55152, 55264, 70115, 70165

C. REFERENCES:

ITSR Guidance: <http://ost.em.doe.gov/efd/ost/pubs/itsrdescript/itsrguidance.pdf>

NMS Database: <http://em-needs.em.doe.gov/entry.asp>.

EMSP Project Information: <http://emsp.em.doe.gov>

SCFA Homepage: <http://www.envnet.org/scfa>

Hanford Resource Center: <http://www.hanford.gov/resourcecenter.html>

Environmental Management at the INEEL: <http://environment.inel.gov/>

Rocky Flats Environmental Data Dynamic Information Exchange:
<http://167.253.8.4/eddie/>

National Energy Technology laboratory (NETL) <http://www.netl.doe.gov>

Environmental Management (EM) <http://www.em.doe.gov>

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D. STATEMENT OF RESEARCH NEEDS:

The major technical research and development areas include:

- (1) Characterization, Monitoring, Modeling and Analysis
- (2) Separations and Reactive Treatments in the Subsurface
- (3) Validation, Verification, and Long-term Monitoring of Containment and Treatment.

Generally, the work will be performed at the offer's site, with the offeror's selected process, equipment and chemicals. DOE has no plans to provide any hazardous or radioactive materials to the offerors to develop the process or concept but may consider providing contaminated soil (or media) for performing a test based on the offer's facility permits. If the offer's process/equipment generates hazardous materials during the applied research, development or demonstration the offerors will be responsible to dispose of the waste generated at their site.

Within each technical area there are key needs for which proposals are sought. A description and the functional performance requirements of the key needs are provided within the following text.

1. Characterization, Monitoring, Modeling and Analysis

The goal is to reduce the cost of or expand the capabilities of subsurface contaminant sampling, modeling, analysis and monitoring. The challenges of locating subsurface contamination is magnified by the wide range of contaminant types (e.g., mixtures of organic solvents, metals, and radionuclides) in the subsurface at many DOE sites; the wide variety of geological and hydrological conditions across the DOE complex; and the wide range of spatial resolutions at which this contamination must be located and characterized, from widely dispersed contamination in groundwater plumes to small isolated hot spots in waste burial grounds.

1(a) Groundwater characterization technologies.

Functional Performance Requirements:

- A complete detection system for in situ measurement is required, with the capability of producing continuous or periodic analysis of contaminants of concern.
- In situ measurement in extraction, injection, or monitoring wells, well points, influent and/or effluent ends of treatment processes or in river substrate would provide real-time monitoring of contaminant concentrations to regulatory compliance levels in remote, down-hole environment.
- Contaminant and detection levels of interest are associated with high-priority NMS needs. Examples of contaminants are as follows (please reference technology needs statements for specific contaminants and detection levels):
 - Hexavalent Chromium
 - Strontium-90
 - DNAPLs

1(b) Soil Characterization

Contaminants with low Kds and long half-lives like Tc-99 and I-129 tend to represent the greatest health risks in long-term risk assessments. Also, strontium contaminated soils and groundwater presents a near-term environmental concern. However, it is difficult to measure the inventories and distribution of these contaminants because they only emit beta particles that do not penetrate the surrounding soil. Therefore, the only way to currently obtain data in the vadose zone is through the costly collection of soil samples. Improved, more cost-effective methods of accessing contaminated soils, taking soil samples, and/or measuring the concentration of beta emitting contaminants are required.

Functional Performance Requirements:

- In situ detection of contaminants under field conditions (e.g. excavation and retrieval operations, soil volume reduction operations)
- Accuracy should be comparable to existing laboratory methods
- The ability to detect buried contaminants prior to removal or disturbance
- Contaminant and detection levels of interest are associated with high-priority NMS needs. Examples of contaminants of concern are as follows (please reference technology needs statements for specific contaminants and detection levels):
 - Tc-99
 - Actinides
 - VOCs
 - Sr-90
 - Ni-59

1 (c) Contaminant Fate and Transport for Risk-Based Remedial Decision-Making

As documented in “Research Needs in Subsurface Science”, prepare by the National Research Council in 2000, significant impediments to the DOE/EM cleanup mission exist in the lack of a toolbox of methodologies to measure, predict, and validate contaminant fate and transport in the subsurface at a field scale. Improved capabilities are specially called for in the following areas:

(1) characterizing physical, chemical, and biological heterogeneity at the scales that control contaminant fate and transport behavior, (2) measuring contaminant migration and system properties that control contaminant movement, and (3) incorporating geological, hydrological, chemical, and biological surfaces heterogeneity into conceptual model formulations at scales that dominate flow and transport behavior.

In view of many research projects funded by the EMSP Program to further conceptual modeling and understanding of the relationships between contaminant distribution and the physical, chemical, microbiological and geologic characteristics of the subsurface sediments, the focus of this solicitation is to seek advanced characterization techniques for determining heterogeneity in the subsurface affecting contaminant fate and transport.

Approaches that allow the identification and measurement of the heterogeneity features that control contaminant fate and transport to be obtained directly (i.e., without having to perform a detailed characterization of the subsurface) are especially needed.

Functional Performance Requirements:

- Characterization methods are needed to define the in situ physical and chemical aspects of the vadose zone, and average field-scale properties describing fluid flow and reaction. These methods need to have the sensitivity to characterize subsurface geohydrologic and geochemical properties with sufficient accuracy to permit prediction of contaminant fate and transport.
- Techniques are needed to determine the distribution of subsurface heterogeneities (natural and those created by waste interaction with the porous medium) that may influence the distribution of contaminants in soil and water. In addition, characterization methods are needed to map groundwater contaminants and other dissolved species that have reached the groundwater back to their sources.
- The information obtained from advanced characterization techniques above must be applicable toward the conceptual models, fate and transport numerical models, and system assessment capabilities that are being developed.

2. Separations and Reactive Treatment in the Subsurface

Despite progress in developing solutions for remediation of subsurface contamination there are still gaps in DOE's technology "tool box" for clean-up of specific contaminants. There also is a need to understand the scientific basis for already developed technologies which would provide the opportunity for significant enhancements of their remediation effectiveness. Some of these technologies only marginally meet functional requirements in the area of performance or longevity. The three sub-areas for which projects are being sought under this PRDA research area are: In-Situ Reactive Treatment Barrier Materials, Mobilization Agents for Contaminants, and In-Situ Chemical Stabilization.

2 (a) In-Situ Reactive Treatment Barrier Materials

The first objective of this subtask is an expansion of the science knowledge base on understanding the mechanisms and kinetics of the activity of reactive barrier materials when emplaced in the environment and how that activity is affected by environmental factors. Such detrimental effects can include changes in the reactivity of the barrier material against the contaminant(s) of concern or changes in the porosity of the barrier limiting effectiveness of the barrier. Barrier materials to be considered in this solicitation include inorganic barrier materials. Manmade materials containing organic components will also be considered. However, naturally occurring organic materials are excluded from consideration under this solicitation.

Note: It is not the intention of this activity to test the effectiveness of newly suggested materials/sorbent, etc. prior to research on the mechanism of failure that has occurred for existing materials. As noted below, once those failure mechanisms have been identified, work on modified or new materials that would be projected to avoid those failure mechanisms could be conducted under subsequent phases of work. In subsequent phases of the research, this knowledge would be used to:

- (a) modify existing barrier materials or their method of application/use to increase their reactivity under 'real world' conditions, extend use to a greater range of contaminant types, or minimize porosity degradation,
- (b) or develop a new class of reactive material based on the knowledge generated, and
- (c) conduct follow-on engineering development, field test, and demonstration activities on the modified or newly developed material.

The contractor/grantee will identify the mechanisms of success/failure of selective types of reactive barrier materials and subsequently develop enhanced sorbent or treatment media systems for use in subsurface permeable barriers for treatment of contaminants of concern (COCs) in the subsurface environment. The media will either chemically alter the COC to a non-hazardous material or sorb it so that in either case aquifer levels are reduced below levels of concern. The technical approach presupposes water movement through the barrier material so that it must be permeable. The sorbent or treatment media should be of high capacity or be regenerable. The R&D would develop not only the media to be used but also a complete system for implementing the technology in the field. This would include a proposed optimum method of emplacing the material and method of retrieval if the sorbent or treatment media cannot be left in place. The developed technology would offer clear economic or health/safety advantages over existing technology.

Functional Performance Requirements:

- These activities are to be directed towards the development of materials that would be used in subsurface permeable barriers to alter the contaminant of concern (COC) to a non-hazardous form or to sorb the COC out of the contaminated water.
- The COC would be reduced in the water flow out of the permeable barrier to below the level of concern.
- The sorbent or treatment media would be stable over the environmental conditions reasonably expected to occur at the site.
- The useful active lifetime must be shown to be appropriate for the COC to be addressed and the method of implementation of the permeable barrier; e.g. funnel-and-gate, left in place, or retrievable, etc. The end state of the sorbent or media must be shown to be compatible with the proposed implementation of the technology, retrievable versus non-retrievable.

- The COC(s) of interest are associated with high priority needs as identified by DOE sites within OST's NMS. Examples of COC(s) for which this solicited work is directed are:
 - Actinide species, including uranium and plutonium
 - Fission products, including cesium, strontium, and technetium
 - Hazardous metals, including chromium and mercury
 - Dense non-aqueous phase liquids (DNAPLs)
 - Volatile organic hydrocarbons (VOCs).

2 (b) Mobilization/Releasing Agents for Enhancement of Removal of Contaminants from Subsurface Hot Spots or Source Areas

The objective of this subtask is to use and expand upon, as necessary, our understanding of the binding forces between soil materials and contaminants to develop technology to overcome those binding forces and allow capture of those contaminants via a control technology.

The contractor/grantee will develop treatment/affinity agents which, when applied or injected to subsurface soils, will release radioactive or other hazardous metal contaminants from contaminated soils to allow removal of the contaminant to the surface for separation/treatment and disposition. It is expected that this technology would be co-implemented with other technology developed or being developed by OST's Subsurface Contaminant Focus Area on impermeable barriers, both horizontal and bottom barriers. These impermeable barriers prevent further migration of the contaminant during the mobilization process.

Functional Performance Requirements:

- Develop technology for in-situ mobilization of radioactive or other hazardous metal contaminants in soils into the aqueous phase for purposes of extraction of the mobilized species.
- The scope of work should address proof of mobilization of the contaminant of concern (COC) from the soil matrix in which it is found, the parameters/limits controlling that mobilization, and the subsequent ability to extract the contaminant from the soil.
- The ability of the technology to remove the contaminant to below levels of concern in the soil should be proved.
- The technology should be shown to be compatible with the materials or methodology used to form the impermeable barriers used to contain the mobilized species.
- The residual mobilization agent and/or its breakdown products should be environmentally benign.

- There should be comparison to competing technologies for accomplishing the remediation activity.
- COC(s) of interest are associated with high-priority NMS needs. The scope of work can address a single or multiple COC(s). Examples of contaminants of concern are as follows:
 - Actinide species, including uranium and plutonium
 - Fission products, including cesium, strontium, and technetium
 - Hazardous metals, including chromium and mercury

2 (c) In-Situ Chemical Stabilization of Subsurface Contaminants

The objective of this subtask is to expand and use our understanding of the mechanisms and kinetics of chemical reactions active in the stabilization of contaminant species in the subsurface. This information would be applied in the development of a technology application for such chemical stabilization. This solicitation excludes consideration of vitrification technologies and bioremediation technologies involving uptake by surface plants, which are being considered in other DOE activities.

The contractor/grantee would develop technologies to chemically fixate radiological or other hazardous contaminants in soils. Ideally such technology would fix the contaminants in place as a long-lived mineral phase or other form which would be stable over a significant portion of the decay period of the radionuclide. This fixated form should be stable over the environmental conditions reasonably expected to occur at the site. Release rate of the contaminant from the fixated form would be below any established or proposed regulatory limit for the contaminant of concern. The developed technology would offer clear economic or health/safety advantages over existing technology.

Functional Performance Requirements:

- These activities are to be directed towards the development of technologies which would fix the contaminate of concern (COC) in place to a chemical, physical form which would prevent migration of the COC from the contaminated area above current or considered regulatory limits.
- This form would be stable over the environmental conditions reasonably expected to occur at the site and over the lifetime of short-lived radionuclides or over a significant time frame for long-lived radionuclides and hazardous metals, whichever is applicable.
- COC(s) of interest are associated with high-priority NMS needs. Examples of contaminants of concern are as follows:
 - Actinide species, including uranium and plutonium
 - Fission products, including cesium, strontium, and technetium
 - Hazardous metals, including chromium and mercury.

3. Validation, Verification, and Long-term Monitoring of Containment and Treatment

Monitoring and validation are necessary throughout the site remediation process. At the front end, monitoring and validation are used to support the development of conceptual and predictive models of subsurface and contaminant behavior. While in the remediation phase, monitoring and validation are used to demonstrate the effectiveness of efforts to remove, treat, or contain contamination and to gain regulatory acceptance for such corrective actions. Moreover, such monitoring and validation efforts can also improve the understanding of the contaminant fate and transport processes and can be used to recalibrate and revise conceptual and predictive models—important elements of the model building process. After remediation is complete, monitoring technologies are used to verify and validate long-term integrity of remedial performance.

3 (a) Long-Term Monitoring

An advanced monitoring network based on optical, electrochemical, electrical, and mechanical techniques, as well as combinations of these, is sought to provide automated and unattended capabilities for long-term verification of remediation performance including treatment, containment, and removal as well as verification of no-further-action decisions. The primary areas for application of long-term monitoring by media type are: water, including groundwater, surface water, and sediments; soil, including release sites, burn pits, burial grounds, and areas contaminated in proximity to buried utilities, tanks, or surrounding buildings; and engineered units, including radioactive, hazardous, and sanitary landfill. The development of monitoring systems may involve the application of conceptual, mathematical, and statistical models to determine the types and locations of observation systems and prediction of the spatial and temporal resolutions at which observations need to be made.

The performance goals for the proposed technology development, i.e., the constituents or parameters addressed, accuracy and precision of measurements and predictability, and target measurement ranges and limits, etc., must be clearly stated. Information concerning the baseline technology and its performance must be provided so the stated benefits of the proposed technology development can be assessed. Specifically, applied research and development is sought for (1) in situ sensor technologies and techniques, (2) improved information processing, and (3) system integration.

Functional Performance Requirements:

- In situ sensor technologies and techniques are needed to provide autonomous monitoring and data archiving capabilities for long-term unattended operation. These technologies should obviate the need for manual sampling and analysis of groundwater and soils, while at the same time eliminating manual preservation of samples, documentation for chain-of-custody, laboratory analysis, or storage of data from analyses. Sensor development should focus on improved features of reliability, robustness, integration with sampling, built-in failure sensing and calibration,

miniaturization, sensitivity, and selectivity. The long-term stability and performance of the materials and monitoring devices in application environments must be addressed.

- Improved information processing is needed to effectively fuse sensor outputs into useful information (such as image display, trend analysis, and early warning diagnosis) for corrective decision-making. The integration of modeling capabilities for contaminant plumes, which allows correlation of model-predicted results with actual field-monitoring results, must improve the confidence level for remediation performance. Telemetry of sensor output to a centrally located processing station must be considered to assure the quality of data transmission and compatibility with data transmission standards.
- Integration of a network of sensors for key indicating parameters with data/information hardware and software is needed to provide a complete monitoring system to allow long-term, automated, and unattended operations.

3 (b) Monitored Natural Attenuation

The concept of Monitored Natural Attenuation (MNA), potentially in conjunction with passive remediation technologies such as phytoremediation, needs to be developed to a deployable status for very large areas of contamination. General categories of contamination include VOC-contaminated groundwater, tritium-contaminated groundwater and metals/radionuclide-contaminated soils and groundwater plumes. Therefore, there is a need for innovative, low-cost monitoring techniques for compliance verification for these very complex passive systems.

Functional Performance Requirements:

- Cost-effective technologies and strategies for addressing the peripheral portions of these regions of contamination must be developed. This approach should consist of a strategy of implementing MNA or MNA supported with passive remediation with suitable modeling and long-term monitoring technologies.
- Monitoring technologies and strategies must be capable of accurately depicting overall contaminant movements and destruction rates over very large areas of soil contamination and groundwater plumes in complex hydrogeologic settings and migration pathways. The monitoring program must be accomplished in a cost-effective manner with the deployment of an appropriate monitoring array.
- The overall strategy should demonstrate cleanup to MCLs or other approved regulatory standards.
- Protocols, which must be accepted by regulators, are required to establish how natural attenuation processes will affect remaining contaminant migration over the long-term.

E. DELIVERABLES AS A RESULT OF THE STATEMENT OF PROGRAM OBJECTIVES:

In addition to the periodic, topical and final reports listed in the Federal Assistance Reporting Requirements Checklist, the Recipient shall provide the following:

- (a) Assessment and Analyses Report
- (b) Topical Report after each Phase completion
- (c) A deployment plan, with attachment C, as guidance must be developed and submitted to the DOE-COR within 90 days of award. This plan must be updated after each gate review. Technologies, in earlier stages of maturity will have less defined deployment plans.
- (d) Test Plan for Field Testing as required
- (e) Final Report required on completion of the contract
- (f) Providing camera ready ITSr after completion of technology Tests/demonstration.

F. BRIEFINGS AS A RESULT OF THE STATEMENT OF PROGRAM OBJECTIVES:

- 1. The contractor shall prepare detailed briefings for presentation to the Contracting Officer's Representative (COR) at Morgantown, West Virginia or at a location designated by the COR. The briefings shall be given by the contractor to explain the plans, progress, and results of the project effort. The first briefing shall be presented within 60 days after award. The contractor shall present a briefing at least 45 days before completion of any Phase effort and a final briefing at least 45 days before the award is due to expire.
- 2. The contractor shall prepare detailed briefings for presentation at the SCFA Mid-Year Meeting generally held in Atlanta, GA (or another selected site which will be determined later). This meeting will discuss the progress made during the 12 month period and the status of the project.
- 3. The contractor shall attend at Gate and Peer reviews which includes providing written response to comments made at those reviews.

ATTACHMENTS:

- A. Gate Review Process
- B. Peer Review Process
- C. Deployment Plan Guidance
- D. Innovative Technology Summary Reports (ITSr)

The above attachments can be found at: "<http://www.netl.doe.gov/business/solicit/>." Then click on Solicitation Number DE-RA26-01NT40891, and select appropriate attachment.

ATTACHMENT B

REPORTING REQUIREMENTS CHECKLIST

REPORTING REQUIREMENTS CHECKLIST

1. Awardee:	2. Identification Number: DE-RA26-01NT40891
3. Report Submission Address: <i>The requested quantity of all required report deliverables shall be submitted to the following address:</i> NETL AAD Document Control Bldg. 921 U.S. Department of Energy National Energy Technology Laboratory P.O. Box 10940 Pittsburgh, PA 15236-0940	

4. Planning and Reporting Requirements:			
	Form No.	Freq.	Number of Copies
A. General Management * <input checked="" type="checkbox"/> Management Plan None O,C 4 <input checked="" type="checkbox"/> Status Report None M 4 <input type="checkbox"/> Summary Report 1332.2			
B. Schedule/Labor/Cost * <input checked="" type="checkbox"/> Milestone Schedule/Plan 1332.3 O,C,PY 4 * <input type="checkbox"/> Labor Plan 1332.4 * <input checked="" type="checkbox"/> Cost Plan 1332.7 O,C,PY 5 <input checked="" type="checkbox"/> Milestone Schedule/Status Report 1332.3 M 4 <input type="checkbox"/> Labor Management Report 1332.8 <input checked="" type="checkbox"/> Cost Management Report 1332.9 M 4			
C. Exception <input type="checkbox"/> Conference Record None <input checked="" type="checkbox"/> Hot Line Report None A 2 <input checked="" type="checkbox"/> Journal Articles/Conference Papers and Proceedings None A 2			
D. Environmental <input checked="" type="checkbox"/> Hazardous Substance Plan None O 3 <input checked="" type="checkbox"/> Hazardous Waste Report None FC 3 <input type="checkbox"/> Environmental Compliance Plan None <input type="checkbox"/> Environmental Monitoring Plan None <input type="checkbox"/> Environmental Status Report None			
E. Technical (One paper copy and one PDF electronic file copy) <input type="checkbox"/> Technical Progress Report None <input checked="" type="checkbox"/> Final Report <input checked="" type="checkbox"/> Draft for Review None FD 4 <input checked="" type="checkbox"/> Final for Approval None FC 4 <input checked="" type="checkbox"/> Topical Report None A 4			
F. Property <input type="checkbox"/> Report of Contractor's Property Management System None <input type="checkbox"/> Annual Report of Property in the Custody of Contractors F 580.1-8 <input type="checkbox"/> High Risk Property Report F580.1-25 <input type="checkbox"/> Report of Physical Inventory of Capital Equipment None <input type="checkbox"/> Report of Physical Inventory of Sensitive Items None <input checked="" type="checkbox"/> Report of Termination or Completion Inventory SF-1428 and SF-120 and F 580.1-7 FC 3			
G. Other <input type="checkbox"/> Key Personnel Staffing Report None <input checked="" type="checkbox"/> Subcontracting Report SF-294 SS 2 <input checked="" type="checkbox"/> Summary Subcontracting Report SF-295 YS 2 <input type="checkbox"/> Software None <input checked="" type="checkbox"/> Other <u>See Text in SPO</u> A 2			

5. Frequency Codes and Due Dates:			
<u>Definition</u> A --- As Required (See attached text for applicability) 0 C --- Contract Change 15 FC --- Final - End of Effort 0 FD --- Final Technical - Draft Version -60 M --- Monthly 25 <u>Property Reports</u> P --- Property Management System - within 6 months of award date YP --- Yearly property - due 10/15 for period ending 9/30 I --- Physical Inventory of Capital Equipment - Biennial from award start date	<u>Calendar Days Due After Event</u> <u>Definition</u> O --- Once After Award 30 Q --- Quarterly (End of Calendar Quarter) 30 S --- Semiannual (End of project year and project half-year) 30 Y --- Yearly (End of project year) 30 PY - Yearly plan for following federal fiscal year -15 <u>Other</u> SS -- Subcontracting Report - Semi-annual due 4/30 and 10/30 for period ending 3/31 and 9/30 respectively YS -- Summary Subcontracting Report - Annually, due 10/30 for period ending 9/30		
* The yearly plans, identified as required in Sections 4A and 4B, are due by September 15 for the following Federal fiscal year.			

6. Special Instructions: The forms identified in the checklist are available at http://www.netl.doe.gov/business/forms/forms.html . Alternate formats are acceptable provided the contents remain consistent with the form. All technical reports submitted to the DOE must be accompanied by a completed and signed NETL F 510.1-5 , addressing patent information.

B.1 GENERAL INSTRUCTIONS FOR THE PREPARATION AND SUBMISSION OF REPORTS (MAR 1999)

The contractor shall prepare and submit (postage prepaid) the plans and reports indicated on the "Reporting Requirements Checklist" to the addressee identified on the checklist. The level of detail the contractor provides in the plans and reports shall be commensurate with the scope and complexity of the effort and shall be as delineated in the guidelines and instructions contained herein. The prime contractor shall be responsible for acquiring data from any subcontractors to ensure that data submitted are compatible with the data elements which prime contractors are required to submit to DOE.

B.2 MANAGEMENT PLAN (JAN 2000)

The Management Plan describes the contractor's approach to performing the effort and producing the products identified in the contractual agreement, and the technical, schedule, cost, and financial management control systems to be used to manage performance.

The outline for the Management Plan and a description of the contents follows:

EXECUTIVE SUMMARY

The executive summary gives DOE/NETL's management a brief, comprehensive overview of the most important aspects of the management plan.

BACKGROUND

This is a discussion of the background of the project, including the scientific, sociological, legislative, and historical factors, that demonstrates the contractor's understanding of the problems, both technical and management, associated with the project.

SCOPE OF THE PROJECT

This section gives a brief overview of the project. It should include:

- general description of project objectives;
- task titles and short descriptions;
- participants.

WORK BREAKDOWN STRUCTURE (WBS)

The scope and complexity of the contractual agreement influence the number of levels required. Each descending level represents an increasingly detailed definition of the work

elements. Level 1 is the goal or objective of the contractual agreement in its entirety. Level 2 consists of the major work products necessary for achieving the goals of the contractual agreement. Level 3 outlines the major element segments (subsystems) necessary for completing Level 2 elements. Work breakdown structure elements are identified by name and number from a progressive, alphanumeric system. For example:

Example:

WBS Level 1: The overview should describe the philosophy underlying the selected technical approach.

WBS Levels 2 and 3: _____

WBS ELEMENT X.X: _____ (TITLE)

OBJECTIVE: State the objective of the task in a concise manner.

BACKGROUND (Not required for Construction Tasks):

With respect to the project objective, what is the current state of understanding?

Given the state-of-the-art, what are the outstanding issues which must be resolved in order to make progress?

TECHNICAL APPROACH (Not required for Construction Tasks): Describe in detail the manner in which the various issues will be resolved. The following are aspects of the work which should be considered and addressed (along with others you feel appropriate):

What experiments will be performed and why?

What materials will be used?

What are the experimental conditions?

What analytical techniques will be employed?

What will be the approach to modeling?

In answering these questions, you should consider how the various tasks relate to one another and to other relevant ongoing work. Task outputs which feed into other tasks (and vice-versa) should be clearly delineated.

DELIVERABLES (Not required for Construction Tasks): Describe specifically the results of the task. These should include:

raw and reduced data and method of presentation;

brief description of models to be developed;

other key results as appropriate.

SUPPORT SYSTEMS AND CONTROLS

In this section, the management, technical, and administrative system that will be used to control and execute the project will be described. Examples of the systems include: systems and engineering analysis, quality assurance, environmental, safety and health, legal support, ADP support, and accounting support.

B.3 STATUS REPORT (MAR 1999)

The Status Report is the contractor's project manager brief narrative assessment (by WBS) of the work actually performed and the overall status of the various tasks.

The Status Report provides a concise narrative assessment of the status of the work being performed under the contractual agreement. DOE management uses the report to monitor status and to provide early recognition of potential problem areas. The report highlights changes to objectives, changes to technical approach, relationship to previously planned activities, task variances from baselines in excess of stipulated thresholds by WBS reporting element, causative factors, and actions taken or proposed to resolve them, list of presentations and publications, as well as factors with potential for causing significant variances in the future. Task progress of major accomplishments for each task in bullet form may also be highlighted. The report identifies open items requiring action by DOE or the contractor. The report also provides a summary assessment of the current situation, including forecast of the near future and the expected impact on project accomplishment.

B.4 SUMMARY REPORT (DOE F 1332.2) (MAR 1999)

The Summary Report provides a concise, top-level summary of schedule, labor, and cost performance against the baseline plans. Most data are presented graphically. The format permits rapid visual comparison of schedule, labor, and cost data. There are three segments: a cost status graph, a labor status graph, and a milestone chart. The cost and labor graphs are cumulative presentations. Planned and actual numerical data presented are for the period specified. Labor and cost variances are shown on a monthly and cumulative basis.

B.5 MILESTONE SCHEDULE/PLAN (DOE F 1332.3) (MAR 1999)

The Milestone Schedule Plan documents the planned or baseline project schedule in the standard DOE format (DOE F 1332.3). It includes a summary sheet showing all tasks/elements identified in the Work Breakdown Structure on a single form, and, for complex efforts, a separate sheet for each task/element which gives more detail. The planned events and milestones for each task/element are included. The standard symbols and charting conventions described on the reverse side of the form are used. The summary sheet includes a line labeled "administration," and denotes events such as subcontract awards, project reviews, etc. An associated milestone log (DOE F 4600.3A) provides a narrative description of events and anticipated dates of initiation/completion.

B.6 LABOR PLAN (DOE F 1332.4) (MAR 1999)

The Labor Plan establishes the planned utilization of labor for the term of the contract necessary to complete the planned work. For projects being managed at the fourth level of the WBS or greater, DOE F 1332.4, Labor Plan, is used. This information must also be reported by WBS element.

B.7 COST PLAN (DOE F 1332.7) (MAR 1999)

The Cost Plan establishes the plan for accruing total costs by WBS element for the life of the contractual agreement. The time-phased baseline establishes the basis for the measurement of actual cost accumulation and provides basic information for updating and forecasting budget requirements. The Cost Plan itemizes accrued costs by WBS element for prior fiscal years, the current fiscal year by month, and future fiscal years until completion of the contractual agreement. For projects being managed to the fourth WBS level, additional forms show cost detail for each task individually.

B.8 MILESTONE SCHEDULE/STATUS REPORT (DOE F 1332.3) (MAR 1999)

The Milestone Schedule/Status Report is used for reporting schedule status and shows the completion status of the activities and events at the same level of detail as shown on the Milestone Schedule Plan. The report also shows changes to the planned schedule. Like the Milestone Schedule/Plan, information is reported by WBS element. DOE Form 1332.3 is used for reporting schedule status.

B.9 LABOR MANAGEMENT REPORT (DOE F 1332.8) (MAR 1999)

This is a periodic report of the status of the labor resources utilization to be compared with the Labor Plan. Labor information is reported by WBS element.

B.10 COST MANAGEMENT REPORT (DOE F 1332.9) (MAR 1999)

This is a periodic report that shows the cost status of the contract and is compared with the Cost Plan. Information is reported by WBS element.

B.11 CONFERENCE RECORD (MAR 1999)

The "Conference Record" documents for the DOE Contracting Officer's Representative (COR), DOE Contracting Officer, and the contractor an understanding of significant decisions, direction or redirection, or required actions resulting from meetings with DOE representatives. It is required for any meeting, conference, or phone conversation in which a decision is made that may change the schedule, labor, cost, or technical aspects of the contractual agreement or the approved baseline plans. The report shall contain the following information as applicable:

1. Report title ("Conference Record"), number, and the date prepared.
2. Contract title and number, and the contractor's name and address.
3. Date of meeting or telephone conversation, with a list of those involved and their titles.
4. Subject(s) discussed, decisions reached, and directions given.
5. Variances from previous directions and conclusions.
6. Required actions.
7. Distribution.
8. Signature of preparer.

B.12 HOT LINE REPORT (JAN 2000)

The "Hot Line" Report may be used to report a major breakthrough in research, development, or design; an event causing a significant schedule slippage or cost overrun; an environmental, safety and health violation; achievement of or failure to achieve an important technical objective; or any requirement for quickly documented direction or redirection. The report shall be submitted by the most rapid means available, usually electronic, and should confirm telephone conversations with DOE representatives. Identification as a "Hot Line Report" serves notice at each link in the delivery chain that expedition in handling is required. Unless otherwise agreed by the parties involved, DOE is expected to take action and respond in a similarly timely manner. The report should include:

1. Contractor's name and address;
2. Contract title and number;
3. Date;
4. Brief statement of problem or event;
5. Anticipated impacts; and
6. Corrective action taken or recommended.

Hot line reports shall document the incidents listed below:

1. Any single fatality or injuries requiring hospitalization of five or more individuals is to be immediately reported.
2. Any significant environmental permit violation is to be reported as soon as possible, but within 24 hours of the discovery of the incident.
3. Other incidents that have the potential for high visibility in the media are to be reported as quickly as possible, but within 24 hours following discovery.
4. Any failure resulting in damage to Government-owned equipment in excess of \$50,000 is to be reported as quickly as possible, but within 24 hours of the discovery of the failure.
5. Any unplanned event which is anticipated to cause a schedule slippage or cost increase significant to the project is to be reported within 24 hours.
6. Any verbal or written Notice of Violation of any Environmental, Safety, and Health statutes arising from the performance of this contract is to be immediately reported.
7. Any accidental spill or release which is in violation of any Environmental, Safety, and Health statutes arising from the performance of this contract is to be immediately reported, but within 24 hours of the discovery of the accident.
8. Any incident which causes a significant process or hazard control system failure, or is indicative of one which may lead to any of the above defined incidents, is to be reported as soon as possible, but within 5 days of discovery.

The requirement to submit Hot Line Reports for the incidents identified in 1, 2, 3, 6, or 7 is for the sole purpose of enabling DOE officials to respond to questions relating to such events from the media and other public.

When an incident is reported in accordance with 4, 5, 6, 7, or 8, the contractor shall conduct an investigation of its cause and make an assessment of the adequacy of resultant action. A written report is required no later than ten (10) calendar days following the incident and shall include an analysis of the pertinent facts regarding the cause, and a schedule of the remedial events and time periods necessary to correct the action.

When an event results in the need to issue a written or verbal statement to the local media, the statement is to be cleared first; if possible, and coordinated with NETL Management and Communications Division, the Contracting Officer Representative (COR) and the Contracting Officer.

B.13 JOURNAL ARTICLES, CONFERENCE PAPERS AND PROCEEDINGS GENERATED BY LARGE BUSINESSES FOR DOE REVIEW (SEPT 2000)

The Contractor shall submit to DOE for review and approval all documents generated by the Contractor, or any subcontractor, which communicate the results of scientific or technical work supported by DOE under this award, whether or not specifically identified in the award, prior to submission for publication, announcement, or presentation. Such documents include journal articles, conference papers and proceedings, etc. Each such document shall be accompanied by a properly completed NETL Form 510.1-5, "Request for Patent Clearance for Release of Contracted Research Documents."

The Contractor shall simultaneously submit a draft version of the document to the DOE COR and the DOE Patent Counsel Office prior to the publication, presentation, or announcement. The document submitted to the DOE Patent Counsel shall be accompanied by a completed NETL Form 510.1-5. The DOE COR and DOE Patent Counsel shall review the draft version of the document and notify the Contractor of approval or recommended changes. The approved final version shall be submitted to the NETL AAD Document Control Coordinator.

The following information shall be provided for conference papers and proceedings, etc.

- Name of conference
- Location of conference (city, state, and country)
- Date of conference (month/day/year)
- Conference sponsor

B.14 JOURNAL ARTICLES, CONFERENCE PAPERS AND PROCEEDINGS GENERATED BY A SMALL BUSINESS OR NONPROFIT ORGANIZATION FOR DOE REVIEW (SEPT 2000)

The Contractor shall submit to DOE for review and approval all documents generated by the Contractor, or any subcontractor, which communicate the results of scientific or technical

work supported by DOE under this award, whether or not specifically identified in the award, prior to submission for publication, announcement, or presentation. Such documents include journal articles, conference papers and proceedings, etc. Each such document shall be accompanied by a properly completed NETL Form 510.1-5, "Request for Patent Clearance for Release of Contracted Research Documents."

The Contractor shall submit a draft version of the document to the COR prior to the publication, presentation, or announcement. The COR shall review the draft version of the document and notify the Contractor of approval or recommended changes. The final version, along with a completed NETL Form 510.1-5, shall be submitted to the NETL AAD Document Control Coordinator.

The following information shall be provided for conference papers and proceedings, etc.

- Name of conference
- Location of conference (city, state, and country)
- Date of conference (month/day/year)
- Conference sponsor

B.15 JOURNAL ARTICLES, CONFERENCE PAPERS AND PROCEEDINGS GENERATED BY A UNIVERSITY FOR DOE REVIEW (SEPT 2000)

The Contractor shall submit to DOE for review and comment all documents generated by the Contractor, or any subcontractor, which communicate the results of scientific or technical work supported by DOE under this award, whether or not specifically identified in the award, prior to submission for publication, announcement, or presentation. Such documents include journal articles, conference papers and proceedings, etc. Each such document shall be accompanied by a properly completed NETL Form 510.1-5, "Request for Patent Clearance for Release of Contracted Research Documents."

The Contractor shall submit a draft version of the document to the COR prior to the publication, presentation, or announcement. The COR shall review the draft version of the document and notify the Contractor of recommended changes. The final version, along with a completed NETL Form 510.1-5, shall be submitted to the NETL AAD Document Control Coordinator.

The following information shall be provided for conference papers and proceedings, etc.

- Name of conference
- Location of conference (city, state, and country)
- Date of conference (month/day/year)
- Conference sponsor

B.16 ENVIRONMENTAL (OCT 2000)

In response, in part, to the requirements of the National Environmental Policy Act of 1969 (NEPA) and other related environmental statutes, the National Energy Technology Laboratory (NETL) requires the submission of various documents that assess the environmental aspects and projected impacts of all of its proposed actions. These documents may include the following: (1) Hazardous Substance Plan; (2) Hazardous Waste Report; (3) Environmental Compliance Plan; (4) Environmental Monitoring Plan; and (5) Environmental Status Reports.

The environmental information provided in these documents will enable NETL to fulfill its responsibilities under NEPA (additional information about the requirements of the National Environmental Policy Act can be found in the DOE NEPA Compliance Guide and 40 CFR 1021) and to monitor the proposer's compliance with other environmental regulations. The implementation of any task associated with a proposed action will be dependent upon DOE submitting and acquiring approval of necessary NEPA documentation. Therefore, to minimize the risk of project delays, it is imperative that these reports be submitted in a timely manner.

The information contained herein specifies the basic environmental requirements for this procurement action, but it is not to be interpreted as containing all necessary information for any given project. Likewise, certain aspects of the requirements may not be applicable. Accordingly, the level of information provided should be sufficient for DOE to assess the environmental implications of the proposed action.

B.17 HAZARDOUS SUBSTANCE PLAN (MAR 1999)

The Contractor shall submit a Hazardous Substance Plan not later than thirty (30) days after initial contract award. The Plan shall specifically identify each Hazardous Substance (as defined under 40 CFR 261, Subpart D, entitled Lists of Hazardous Wastes) anticipated to be purchased, utilized or generated in the performance of this contract. For each such Hazardous Substance identified, the Plan shall specifically provide the following information:

- Description of Substance/Chemical
- EPA Hazardous Waste Number
- EPA Hazard Code
- Anticipated Quantity to be purchased, utilized or generated
- Anticipated Hazardous Waste Transporter
- Anticipated Hazardous Waste Disposal Facility Contractor and Location (City/Municipality, State)
- Anticipated Treatment Method

B.18 HAZARDOUS WASTE REPORT (MAR 1999)

The Contractor shall submit a Hazardous Waste Report at the completion of contract performance. The Report shall specifically identify each Hazardous Waste (as defined under 40 CFR 261, Subpart D, entitled Lists of Hazardous Wastes) actually utilized, or generated in the performance of this contract. For each such Hazardous Waste identified, the Report shall specifically provide the following information:

- Description of Substance/Chemical
- EPA Hazardous Waste Number
- EPA Hazard Code
- Actual Quantity Disposed
- Actual Hazardous Waste Transporter
- Actual Hazardous Waste Disposal Facility Contractor and Location (City/Municipality, State)
- Actual Disposal Date
- Actual Treatment Method

The Hazardous Waste Report is intended as a final reconciliation of anticipated versus actual Hazardous Substances purchased, utilized, or generated in the performance of this contract.

B.19 ENVIRONMENTAL COMPLIANCE PLAN (JAN 2000)

The Environmental Compliance Plan (ECP) shall be submitted within thirty (30) days of contract award and should outline an approach to implementing an environmental monitoring and reporting strategy. This strategy should include plans for submitting a Quality Assurance/Quality Control Plan and Pollution Prevention Plan (if an ECP is required, the format of the QA/QC Plan and Pollution Prevention Act will be determined in conjunction with the NETL environmental staff), conducting environmental monitoring of the proposed action and submitting Environmental Status Reports. The ECP should also address any concerns and/or deviations associated with the reporting and monitoring documents.

Suggested Format for Environmental Compliance Plan (ECP):

I. SUMMARY OF PROPOSED PROJECT

II. FEDERAL REGULATORY COMPLIANCE (Discuss how each of the following will be complied with, if applicable.)

- A. National Historic Preservation Act
- B. Endangered Species Act

- C. Fish and Wildlife Coordination Act
- D. Floodplain/Wetlands Regulations
- E. Coastal Zone Management Act
- F. Farmland Protection Policy Act
- G. American Indian Religious Freedom Act
- H. Wild and Scenic Rivers Act
- I. Resource Conservation & Recovery Act
- J. Comprehensive Environmental Response, Compensation and Liability Act
- K. Clean Air Act
- L. Clean Water Act
- M. Pollution Prevention Act

III. STATE AND LOCAL REGULATORY COMPLIANCE (Discuss how any state and local regulations will be complied with.)

B.20 ENVIRONMENTAL MONITORING PLAN (MAR 1999)

IF DOE's analysis of the potential environmental impacts of the proposed action identifies a need for environmental monitoring, the Contractor will also submit a draft Environmental Monitoring Plan (EMP) within thirty (30) days of contract award. After consultation with DOE, the draft EMP will be revised, as necessary, and a final EMP will be prepared. The EMP may be revised as the project dictates.

The EMP should evaluate air, land, and water resources, and waste production, using three specific types of monitoring:

- A. Compliance Monitoring,
- B. Unregulated Pollutant Monitoring, and, if necessary,
- C. NEPA-related Monitoring.

Compliance monitoring, i.e., environmental and health monitoring required by Federal, State, and local regulatory agencies, should detail the location, frequency, duration, and substances being monitored. All necessary applications, permits, and licenses should be identified.

Unregulated pollutants, both the amount and type of each, should be monitored. This includes those pollutants (a) not currently regulated by State or Federal laws but for which new regulations are expected in the near future; (b) which may cause environmental or health concerns based on hazardous/toxic compound lists; and (c) which are expected in discharge streams based on test data or process chemistry.

Finally, NEPA-related monitoring should be implemented as necessary. It should identify and/or confirm the impacts of the substances produced and performance of the specific technologies as predicted in the NEPA document. It should also include reporting on any mitigation action identified in the Finding of No Significant Impact or Record of Decision as a condition of approval of the proposed action (reported annually).

B.21 ENVIRONMENTAL STATUS REPORT (MAR 1999)

After approval of the comprehensive EMP, and as deemed necessary by the DOE Project Manager, information from environmental monitoring should be submitted in the form of Environmental Status Reports (ESRs). The necessity of these reports will depend on the size and nature of the project; they will be required quarterly.

The data reported in the ESRs will ensure that project impacts (a) do not violate applicable environmental regulations and (b) are not detrimental to human health or the environment. The information will also provide a database that can be utilized to mitigate environmental problems associated with commercializing any proposed technologies.

Suggested Format for Environmental Status Reports

I. SUMMARY OF MONITORING PERFORMED (Compliance and Supplemental Monitoring)

A. MONITORING PARAMETERS

1. Location
2. Stage of Project (e.g., preconstruction, operational, etc.)
3. Source to be Monitored (e.g., stack emissions)
4. Method of Monitoring

B. DATA ANALYSIS

1. Identification/characterization of emissions, effluents, etc. and their concentration
2. Identification of problem areas/non-compliance
3. Suggestions for modifications/changes to the system
4. Recommendations to revise Monitoring Plan

II. PERMIT COMPLIANCE STATUS

- A. Attach copies of compliance reports, analyses, correspondence between the Contractor and the appropriate regulatory agencies.
- B. Attach copies of all manifests, shipping documents, etc. pertaining to the disposal of wastes generated from the project.

B.22 TECHNICAL REPORTS (SEPT 2000)

CAUTION: Technical reports SHALL NOT include Limited Rights Data (such as restricted, proprietary or business sensitive information). Limited Rights Data shall be submitted in a separate appendix to the technical report. This appendix SHALL NOT be submitted in an electronic format but rather submitted in ONE ORIGINAL AND THREE (3) PAPER COPIES along with the paper version of the sanitized technical report deliverable. The appendix shall be referenced in, but not incorporated into , the sanitized technical report deliverable under the contract. In accordance with FAR 52.227-14, Rights in Data-General, the appendix must be appropriately marked and identified.

Further, if this award authorizes the awardee under the provisions of The Energy Policy Act of 1992 to request protection from public disclosure for a limited period of time of certain information developed under this award, technical reports SHALL NOT contain such Protected EAct Information. Such information shall be submitted in a separate appendix to the technical report that is suitable for release after the agreed upon period of protection from public disclosure has expired. The appendix shall be referenced in, but not incorporated into , the sanitized technical report deliverable under the contract. In accordance with the clause titled "Obligations as to Protected Energy Policy Act (EAct) Information," the appendix must be appropriately marked and identified.

All TECHNICAL REPORTS submitted to the DOE MUST be accompanied by a completed and signed NETL F 510.1-5, addressing potentially patentable information.

B.23 TECHNICAL PROGRESS REPORT (ANNUAL, QUARTERLY, AND SEMI-ANNUAL) (MAR 1999)

The body of the report should contain a full account of progress, problems encountered, plans for the next reporting period, and an assessment of the prospects for future progress.

The Technical Progress Report should include sufficient detail to allow the work to be reproduced by others. Results and reduced data shall be presented together with a discussion of the relevance of the findings. When experimental systems and/or procedures

are being utilized for the first time, they shall be described in detail. This description shall contain detailed information on equipment and procedures utilized, as well as providing a rationale for their use. All data reduction and transformation methods shall be fully documented. For every fourth calendar quarter for quarterly reports or every second half year for semi-annual reports, the report should be expanded to provide for detailed information on the results of the past year, problems encountered, significant accomplishments, listing of publications, presentations, and approaches to be taken the following year.

Informational items in technical progress reports shall include:

Experimental Apparatus -- A comprehensive description, including dimensioned drawings or sketches, of the apparatus and associated diagnostic measurement equipment employed to perform the experimental research.

Experimental and Operating Data -- All experimental data acquired during the course of research including detailed characterization of the sample materials subjected to experimentation.

Data Reduction -- A complete description of the methods employed to transform raw measured data into a form usable for interpretation along with any assumptions or restrictions inherent in the method and the resultant reduced data.

Hypothesis and Conclusions -- Logic for drawing conclusions or developing hypotheses shall be clearly stated along with applicable assumptions or restrictions.

B.24 FINAL TECHNICAL REPORT (MAR 1999)

The Final Report shall document and summarize all work performed during the contract period in a comprehensive manner. It shall also present findings and/or conclusions produced as a consequence of this work. This report shall not merely be a compilation of information contained in subsequent quarterly, or other technical reports, but shall present that information in an integrated fashion, and shall be augmented with findings and conclusions drawn from the research as a whole.

The contractor shall deliver a draft copy of the final report sixty (60) days before the completion of the period of performance. The Government shall be allowed thirty (30) days to review the draft copy and to notify the contractor, in writing, of approval or recommended changes. If the Government does not approve or recommend changes within thirty (30) days of receipt of the draft copy, the report shall be deemed approved. The approved final report is due on the contract completion date.

B.25 TOPICAL REPORT (MAR 1999)

These reports usually provide a comprehensive statement of the technical results of the work performed for a specific task or subtask of the Statement of Work (SOW), or detail significant new scientific or technical advances. If required, DOE shall review and approve the report outline prior to submission of the report.

B.26 GUIDELINES FOR ORGANIZATION OF TECHNICAL REPORTS (DEC 1999)

The following sections should be included (as appropriate) in technical reports in the sequence shown. Any section denoted by an asterisk is required in all technical reports.

TITLE PAGE* - The Title Page of the report itself must contain the following information in the following sequence:

Report Title

Type of Report (Quarterly, Semi-Annual, Annual, Topical, Final)

Reporting Period Start Date

Reporting Period End Date

Principal Author(s)

Date Report was Issued (Month [spelled out] and Year [4 digits])

DOE Award Number (e.g., DE-AC26-99NT12345) and if appropriate, task number

Name and Address of Submitting Organization (This section should also contain the name and address of significant contractors or subcontractors who participated in the production of the report.)

DISCLAIMER* -- The Disclaimer must follow the title page, and must contain the following paragraph:

“This report was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States Government nor any agency thereof, nor any of their employees, makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial product, process, or service by trade name, trademark, manufacturer, or otherwise does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government or any agency thereof. The views and opinions of authors expressed herein do not necessarily state or reflect those of the United States Government or any agency thereof.”

ABSTRACT* - should be a brief, concise summary of the report.

TABLE OF CONTENTS*

LIST(S) OF GRAPHICAL MATERIALS

INTRODUCTION

EXECUTIVE SUMMARY - this should be a well organized summary that highlights the important accomplishments of the research during the reporting period. It should be no less than one page and no more than two pages in length, and should be single spaced. This summary must be more comprehensive than the traditional “abstract.”

EXPERIMENTAL* - this should describe, or reference all experimental methods being used for the research. It should also provide detail about materials and equipment being used. Standard methods can be referenced to the appropriate literature, where details can be obtained. Equipment should be described only if it is not standard, or if information is not available thru the literature or other reference publications.

RESULTS AND DISCUSSION* - It is extremely important that this section includes enough relevant data, especially statistical data, to allow the project manager to justify the conclusions. With the relevant data, explain how the data was interpreted and how it relates to the original purpose of the research. Be concise in the discussion on how this research effort solved or contributed to solving the original problem.

CONCLUSION* - The conclusion should not simply reiterate what was already included in the “Results and Discussion” section. It should, however, summarize what has already been presented, and include any logical implications of how the successes are relevant to technology development in the future. This is extremely important, since “relevancy” continues to be a criteria of the program.

REFERENCES*

BIBLIOGRAPHY

LIST OF ACRONYMS AND ABBREVIATIONS

APPENDICES (IF NECESSARY)

Company Names and Logos -- Except as indicated above, company names, logos, or similar material should not be incorporated into reports.

Copyrighted Material -- Copyrighted material should not be submitted as part of a report unless written authorization to use such material is received from the copyright owner and is submitted to DOE with the report.

Measurement Units -- All reports to be delivered under this instrument shall use the SI Metric System of Units as the primary units of measure. When reporting units in all reports, primary SI units shall be followed by their U.S. Customary Equivalents in parentheses ().

The contractor shall insert the text of this clause, including this paragraph, in all subcontracts under this award.

Note: SI is an abbreviation for "Le Systeme International d'Unites."

B.27 ELECTRONIC MEDIA STANDARD FOR PREPARATION OF TECHNICAL REPORTS (DEC 1999)

FILE FORMAT

Production of high-quality, electronic documents is dependent on the quality of the input that is provided. Thus, the contractor shall submit one good quality paper copy using either permanent or alkaline paper plus an electronic version of each technical report.

ELECTRONIC REPORTS SHALL BE SUBMITTED IN THE ADOBE ACROBAT PORTABLE DOCUMENT FORMAT (PDF). ELECTRONIC REPORTS SUBMITTED IN A FORMAT OTHER THAN ADOBE WILL BE RETURNED AND THE REPORT CONSIDERED DELINQUENT.

Each report shall be an integrated file that contains all text, tables, diagrams, photographs, schematics, graphs, and charts.

SUBMISSION FORMAT

The electronic file(s) shall be submitted via diskette or CD-ROM. Diskettes or CD-ROMs must be labeled as follows:

DOE Award Number
Type/Frequency of Report(s)
Reporting Period (if applicable)
Name of submitting organization
Name, phone number and fax number of preparer

Diskettes -- Diskettes must be 3.5" double-sided, high-density (1.4 M Byte capacity). If file compression software is used to transmit a PDF file spanning more than one diskette, PKZIP from PKWare, Inc., is the required compression software. State the number of diskettes in the set (e.g., 1/3)

CD-ROM -- The electronic file(s) may be submitted on an ISO9660-format CD-ROM.

FILE NAMING

In naming the electronic file, the contractor shall use the standard eight-character naming convention for the main file name, and the three character extension applicable to the software use, e.g., .pdf for Adobe.

For the main file name, the first five characters are the last five digits from the award number; e.g., for Award Number DE-AC26-97NT12345, the first five characters are 12345.

The next character represents the technical report and will always be designated as "R".

The remaining two characters indicate the chronological number of the particular type of report; e.g., Quarterly Technical Progress Reports for a 5-year award are numbered R01 through R20. Thus, the main file name for the sixth Quarterly Technical Progress Report under Award No. DE-AC26-99NT12345 would be 12345R06.PDF. If monthly, quarterly, annual, and a final technical report are required, the numbers would run from R01 through R86 (60 monthly reports, 20 quarterly reports, 5 annual reports, and 1 final report).

B.28 PROPERTY REPORTS (JAN 2000)

The NETL Property Handbook entitled "Management of Government Property in the Possession of Contractors," contains forms, instructions, and suggested formats for submission of property reports. This handbook can be found at <http://www.netl.doe.gov/business/index.html>.

B.29 REPORT OF CONTRACTOR'S PROPERTY MANAGEMENT SYSTEM (JAN 2000)

This report shall consist of the Contractor's comprehensive written property management system and is due within 6 months of the contract award date. It shall address the Contractor's written system for controlling, protecting, preserving and maintaining all Government property. The report format shall be consistent with Contractor's system and shall as a minimum enable comprehensive evaluation by the Government. (If not provided in your local format, see sample in the NETL Property Handbook).

B.30 ANNUAL REPORT OF PROPERTY IN THE CUSTODY OF CONTRACTORS (NETL F 580.1-8) (JAN 2000)

This report includes ALL Government-owned Contractor-acquired and Government-furnished property and materials for which the contractor is accountable to the Government. This report shall also include Government Property at subcontractor's plants and alternate locations. This report is submitted on NETL F 580.1-8 for the period ending September 30 and is due by October 15.

B.31 HIGH RISK PROPERTY REPORT (NETL F 580.1-25) (SEPT 2000)

Some property, because of its peculiar nature, its potential impact on public health and safety, on the environment, on security interests, or on proliferation concerns, must be handled, controlled, cleared and disposed of in other than the standard manner. High-risk property includes property which is: 1) nuclear-related; 2) proliferation-sensitive or export controlled; 3) chemically, biologically, or radiologically contaminated; 4) national security/military interests; and 5) hazardous materials and wastes. Further definitions of high-risk property can be found at <http://www.pr.doe.gov/ppl.html>. This report is required by the DOE for the control (acquisition, management and disposal) of high risk property to ensure that such disposition does not adversely affect public safety and/or the environment, national security, or nuclear nonproliferation objectives of the United States. This report shall be submitted for the period ending September 30 and is due by October 15 of each year.

B.32 REPORT OF PHYSICAL INVENTORY OF CAPITAL EQUIPMENT (JAN 2000)

Capital equipment is any piece of personal property, equipment, or furniture with a useful service life of 2 years or more and is acquired at a unit cost of \$25,000 or more. The suggested format for this report can be found in the NETL Property Handbook at <http://www.netl.doe.gov/business/index.html>. This report is due 2 years from award date and every 2 years thereafter.

B.33 REPORT OF PHYSICAL INVENTORY OF SENSITIVE ITEMS (JAN 2000)

Sensitive items are identified as small calculators, tape recorders, radios, photographic and projection equipment, typewriters and other office machines, firearms, survey instruments, binoculars, power tools, personal computers, printers, external modems, or other equipment, which because of its general use characteristics and ease of transport are particularly susceptible to misappropriation or theft. These items will usually have an acquisition cost of less than \$25,000. The suggested format for this report can be found in the NETL Property Handbook at <http://www.netl.doe.gov/business/index.html>. The report is to be submitted one year from the date of award and yearly thereafter.

B.34 REPORT OF TERMINATION OR COMPLETION INVENTORY (SF-1428 AND SF-120) (MAR 1999)

This report submitted on the SF-1428 and SF-120 is due immediately upon completion or termination of the contract. The contractor is required to perform and cause each subcontractor to perform a physical inventory, adequate for disposal purposes, of all Government property applicable to the contract.

B.35 KEY PERSONNEL STAFFING REPORT (MAR 1999)

A report shall be filed providing information on the number of hours (by WBS element/task) that each of the key personnel listed in the contract have applied to the contract during the reporting time period.

B.36 SUBCONTRACT REPORTING (FEB 2000)

With the exception of a small business, reports listed below are required to be submitted electronically by the prime contractor for each contract containing a subcontracting plan. These electronic forms collect subcontract award data from prime contractors/subcontractors that: (a) hold one or more contracts over \$500,000 of the Government share amount (over \$1,000,000 for construction of a public facility); and (b) are required to report subcontracts awarded to Small Business (SB), Small Disadvantaged Business (SDB), and Women-Owned Small Business (WOSB) concerns under a subcontracting plan. Subcontract award data reported by prime contractors/subcontractors shall be limited to awards made to their immediate subcontractors.

SUBCONTRACTING REPORT (SF294)

Semi-annual Frequency

Period End Dates: 3/31 and 9/30

Due Dates: 4/30 and 10/30

Note: The first deliverable of this report is due whichever of the two dates is at least 60 calendar days after the award start date.

SUMMARY SUBCONTRACTING REPORT (SF295)

Annual Frequency

Period End Date: 9/30

Due Date: 10/30

Note: The first deliverable of this report is only required for the next period end date of 9/30, which is at least 60 calendar days after the award start date.

SUBCONTRACT REPORTING SYSTEM (SRS)

All subcontracting reports SF294's and SF295's must be submitted electronically. Access to the SRS can be made at <http://www.pr.doe.gov/srs/>. All contractors must register with the Headquarters SRS Systems Manager and use it to submit the

required reports. When registering, the contractor must provide a valid DUNS number. When registration is approved, the contractor may use the system simply by logging in with his or her user name and password and transmit SF-294 and 295 data to the contracting office that requires the report. After review by the contracting office, the data will be forwarded via the Internet to DOE Headquarters. A comprehensive manual for the system may be found at <http://www.pr.doe.gov/pr3.html>.

B.37 SOFTWARE (MAR 1999)

Major pieces of computer software developed largely as a result of the performance of this effort shall be delivered to the Government shortly after development or at the completion of the effort, as appropriate. The software shall be delivered together with sufficient documentation concerning its development and use to permit future use by others, and to provide a firm basis for allowing modifications to be made in any subsequent development efforts. Unless otherwise specified, software shall be written in a standard computer language such as Fortran 77, operate on the VAS VMS version 5.1 operating system or an IBM PC-compatible personal computer running MS/DOS, and should not incorporate or be dependent on the use of proprietary software.

ATTACHMENT C

GOVERNMENT PROPERTY - CONTRACTOR ACQUIRED

ATTACHMENT C

GOVERNMENT PROPERTY - CONTRACTOR ACQUIRED (MAR 1999)

<u>Item No.</u>	<u>Description of Items(s) to be Acquired</u>	<u>Est. Cost</u>
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To Be Completed By Offer; if none; so indicate on this form.

ATTACHMENT D

GOVERNMENT FURNISHED PROPERTY

ATTACHMENT D

GOVERNMENT FURNISHED PROPERTY

<u>Item No.</u>	<u>Description of Items(s) to be Acquired</u>	<u>Est. Cost</u>
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To Be Completed By Offer; if none; so indicate on this form.

ATTACHMENT E
SMALL, SMALL DISADVANTAGED AND WOMEN-OWNED BUSINESS
SUBCONTRACTING PLAN

(reference FAR 52.219-9 and DEAR 952.226.72)

ATTACHMENT E

SAMPLE SMALL BUSINESS SUBCONTRACTING PLAN (NOV 2000)

DATE: []

CONTRACTOR: []

ADDRESS: []

SOLICITATION OR CONTRACT NUMBER: []

ITEM/SERVICE: []

The following, together with any attachments, is hereby submitted as a Small Business Subcontracting Plan to satisfy the applicable requirements of Public Law 95-507 as implemented by FAR Clause 52.219-9.

1. The total estimated dollar value of all planned subcontracting (to all types of business concerns) under this contract is: \$ []
2. The following percentage goals (expressed in terms of a percentage of total planned subcontracting dollars) are applicable to the contract cited above or to the contract awarded under the solicitation cited.
 - (a) Small business concerns: [] % of total planned subcontracting dollars under this contract will go to subcontractors who are small business concerns.
 - (b) Veteran-owned small business concerns: [] % of total planned subcontracting dollars under this contract will go to subcontractors who are veteran-owned small business concerns. This percentage is included in the percentage shown under 2(a), above.
 - (c) HUBZone small business concerns: [] % of total planned subcontracting dollars under this contract will go to subcontractors who are HUBZone small business concerns. This percentage is included in the percentage shown under 2(a), above.
 - (d) Small disadvantaged business concerns: [] % of total planned subcontracting dollars under this contract will go to subcontractors who are small disadvantaged business concerns. This percentage is included in the percentage shown under 2(a), above.

- (e) Women-owned small business concerns: [] % of total planned subcontracting dollars under this contract will go to subcontractors who are women-owned small business concerns. This percentage is included in the percentage shown under 2(a), above.

The following dollar values correspond to the percentage goals shown in 2. above.

- (a) Total dollars planned to be subcontracted to small business concerns:
\$ [].
- (b) Total dollars planned to be subcontracted to veteran-owned small business concerns:
\$[]. This amount is included in the amount shown under (a), above.
- (c) Total dollars planned to be subcontracted to HUBZone small business concerns:
\$[]. This amount is included in the amount shown under (a), above.
- (d) Total dollars planned to be subcontracted to small disadvantaged business concerns:
\$[]. This amount is included in the amount shown under (a), above.
- (e) Total dollars planned to be subcontracted to women-owned small business concerns:
\$[]. This amount is included in the amount shown under (a), above.

[THE OFFEROR MAY PRESENT THIS INFORMATION AS FOLLOWS:]

GOALS PROJECTED FOR THE CURRENT CONTRACT

Total Subcontracting Dollars	[\$_____]
Small Business Dollars	[\$ _____]
Small Business Percent	[_____%]
Veteran-owned Small Business Dollars	[\$_____]
Veteran-owned Small Business Percent	[_____%]
HUBZone Small Business Dollars	[\$ _____]
HUBZone Small Business Percent	[_____%]

Small Disadvantaged Dollars [\$ _____]

Small Disadvantaged Percent [_____%]

Women-owned Small Business Dollars [\$_____]

Women-owned Small Business Percent [_____%]

3. Principal products and/or services to be subcontracted under this contract are listed below along with the distribution to small, veteran-owned, HUBZone, small disadvantaged, women-owned small business, or large business concerns:

SMALL BUSINESS: []

VETERAN OWNED SMALL BUSINESS: []

HUBZONE SMALL BUSINESS: []

SMALL DISADVANTAGED BUSINESS: []

WOMEN-OWNED SMALL BUSINESS: []

LARGE BUSINESS: []

4. The following method was used in developing subcontract goals: **[The offeror will insert a statement explaining how the products and services to be subcontracted were established, how the products and services to be subcontracted to small, veteran-owned, HUBZone, small disadvantaged, and women-owned business concerns were determined, and how capabilities of these firms were substantiated prior to their inclusion in source lists.]**
5. The following methods were used to identify potential sources for solicitation purposes: **[The offeror will insert items such as, existing company source lists, the Procurement marketing and Access Network (PRO-Net) of the Small Business Administration (SBA), the list of certified small disadvantaged business concerns of the SBA, the National Minority Purchasing Council Vendor Information Service, the Research and Information Division of the Minority Business Development Agency in the Department of Commerce, or small, veteran-owned, HUBZone, small disadvantaged, and women-owned small business trade associations. Other examples include: review "subcontractable" requirements to determine applicability to small, veteran-owned, HUBZone small/disadvantaged and women-owned business concerns.]**

6. Indirect costs (check one below):

[] have been,

[] have not been

included in the goals specified in Item 2. **[If so, describe the method used to determine the proportionate share of indirect costs to be incurred with small, veteran-owned, HUBZone, small disadvantaged and women-owned business concerns.]**

7. The following individual will administer the subcontracting program:

Name: []

Title: []

Address and Telephone: []

This individual's specific duties, as they relate to the firm's subcontracting program, are as follows:

General overall responsibility for this company's Small Business Program, the development, preparation and execution of individual subcontracting plans, and for monitoring performance relative to contractual subcontracting requirements contained in this plan. **[The offeror will include a specific list of this individual's duties. These duties may include:**

- (a) Developing and maintaining bidders lists of small and small disadvantaged business concerns from all possible sources.
- (b) Ensuring that procurement packages are structured to permit small and small disadvantaged business concerns to participate to the maximum extent possible.
- (c) Assuring inclusion of small and small disadvantaged business concerns in all solicitations for products or services which they are capable of providing.
- (d) Reviewing solicitations to assure that no statements or clauses are included which may tend to restrict or prohibit small/small disadvantaged business participation.
- (e) Ensuring that corporate proposal reviewers document reasons for not selecting low bids submitted by small and small disadvantaged business concerns.

- (f) Ensuring the establishment and maintenance of records of solicitations and subcontract award activity.
 - (g) Attending or arranging for attendance of company counselors at Business Opportunity Workshops, Minority Business Enterprise Seminars, Trade Fairs, etc.
 - (h) Conducting or arranging for conduct of motivational training for purchasing personnel pursuant to the intent of Public Law 95-507.
 - (i) Monitoring attainment of proposed goals.
 - (j) Preparing and submitting periodic subcontracting reports required.]
8. The following efforts will be taken to assure that small business, veteran-owned, HUBZone small business, small disadvantaged business and women-owned business concerns will have an equitable opportunity to compete for subcontracts: **[The offeror will include a list of specific efforts to be taken. Such efforts may include:**
- (a) Maintenance of small, small disadvantaged and women-owned small business concerns source lists, guides, and other data identifying small, veteran-owned, HUBZone, small disadvantaged and women-owned business concerns and utilized by buyers in soliciting subcontracts.
 - (b) Utilization of small, veteran-owned, HUBZone, small disadvantaged, and women-owned business source lists by buyers.
 - (c) Internal efforts to guide and encourage buyers:
 - (i) Attendance at small and small disadvantaged workshops, seminars, and training programs.
 - (ii) Monitoring of activities to assure compliance with subcontracting plan.]
9. **[Insert Firm's Name]** agrees that the clause entitled "Utilization of Small Business Concerns" will be included in all subcontracts which offer further subcontracting opportunities; and all subcontractors (except small business concerns) who receive subcontracts in excess of \$500,000 will be required to adopt and comply with a subcontracting plan similar to this one. Such plans will be reviewed by comparing them with the provisions of FAR 52.219-9, and assuring that

all minimum requirements of an acceptable subcontracting plan has been satisfied. The acceptability of percentage goals shall be determined on a case-by-case basis depending on the supplies/services involved and the availability of potential small business subcontractors. Once approved and implemented, plans will be monitored through the submission of periodic reports, periodic visits to subcontractors facilities to review applicable records, and subcontracting program progress.

10. **[Insert Firm's Name]** agrees to submit periodic reports and cooperate in any studies or surveys as may be required by the contracting agency or the Small Business Administration in order to determine the extent of compliance with the subcontracting plan and with the clause entitled "Utilization of Small Business Concerns" contained in the contract. We further agree to submit Standard Form 294, Subcontracting Report for Individual Contracts, and/or Standard Form 295, Summary Subcontract Report, in accordance with the instructions on the forms.

Additionally, we will ensure that our subcontractors agree to submit SF 294 and SF 295, when applicable.

The Standard Form 294 and Standard Form 295 will be submitted electronically using the Subcontract Reporting System (SRS) at <http://www.pr.doe.gov/srs/>.

11. **[Insert Firm's Name]** agrees to maintain at least the following types of records to document compliance with this subcontracting plan:
 - (a) Source Lists (e.g. PRO-Net) , guides, and other data that identify small business, veteran-owned small business, HUBZone small business, small disadvantaged business, and women-owned small business concerns.
 - (b) Organizations contacted in an attempt to locate sources that are small business, veteran-owned small business, HUBZone small business, small disadvantaged business, or women-owned business concerns.
 - (c) Records on each subcontract solicitation resulting in an award of more than \$100,000, indicating on each solicitation
 - (i) Whether small business concerns were solicited, and if not, why not;
 - (ii) Whether veteran-owned small business concerns were solicited, and if not, why not;
 - (iii) Whether HUBZone small business concerns were solicited, and if not, why not;

- (iv) Whether small disadvantaged business concerns were solicited, and if not, why not;
 - (v) Whether women-owned small business concerns were solicited, and if not, why not; and
 - (vi) If applicable, the reason award was not made to a small or small disadvantaged business concern.
- (d) Records of any other outreach efforts to contact trade associations, business development organizations, and conferences and trade fairs to locate small, veteran-owned, HUBZone small, small disadvantaged, and women-owned small business concerns.
- (e) Records of internal guidance and encouragement provided to buyers through workshops, seminars, and training programs; and monitoring of performance to evaluate compliance with program requirements.
- (f) On a contract-by-contract basis, records to support award data including the name, address and business size of each subcontractor. **[Contractors having commercial plans need not comply with this requirement.]**

ATTACHMENT F

NATIONAL ENVIRONMENTAL PROTECTION ACT (NEPA)

ENVIRONMENTAL QUESTIONNAIRE

ENVIRONMENTAL QUESTIONNAIRE

I. BACKGROUND

The Department of Energy's (DOE) National Environmental Policy Act (NEPA) Implementing Procedures (10 CFR 1021) require careful consideration of the potential environmental consequences of all proposed actions during the early planning stages. DOE must determine at the earliest possible time whether such actions require either an Environmental Assessment or an Environmental Impact Statement, or whether they qualify for Categorical Exclusion. To comply with these requirements, an Environmental Questionnaire must be completed for each proposed action to provide DOE with the information necessary to determine the appropriate level of NEPA review.

II. INSTRUCTIONS

Separate copies of this Environmental Questionnaire should be completed by the principal offeror and each proposed subcontractor. In addition, if the proposed project includes activities at different locations, an independent questionnaire should be prepared for each location. Supporting information can be provided as attachments.

In completing this questionnaire, the proposer is requested to provide specific quantities regarding air emissions, wastewater discharges, solid wastes, etc., to facilitate the necessary review. In addition, the proposer should identify the exact location of the project and specifically describe the activities that would occur at that location.

To expedite completion of this questionnaire, diskette copies in WordPerfect 6.1 are available upon request. Questions regarding the type of information requested or the approach to preparing responses should be referred to Lloyd Lorenzi, U.S. Department of Energy, National Energy Technology Laboratory, by phone (412) 386-6159, fax (412) 386-6127, or E-mail (lorenzi@netl.doe.gov).

III. QUESTIONNAIRE

A. PROJECT SUMMARY

1. Solicitation Number:
2. Proposer & all Proposed Subcontractors:
3. Principal Investigator:
4. Telephone Number:
5. Project Title:

6. Duration:
7. Location (city/township, county, state):
8. Indicate the type or scale of project:

- | | |
|---|--|
| a. <input type="checkbox"/> Computer Modeling | b. <input type="checkbox"/> Library/Literature Search |
| c. <input type="checkbox"/> Paper Study | d. <input type="checkbox"/> Workshop/Conference |
| e. <input type="checkbox"/> Laboratory (Batch) Research | f. <input type="checkbox"/> Bench-scale Research |
| g. <input type="checkbox"/> Pilot- or Proof-of-Concept-Scale Research | h. <input type="checkbox"/> Pilot Plant Construction/Operation |
| i. <input type="checkbox"/> Full-Scale Demonstration | j. <input type="checkbox"/> Other (please describe): |

9. Indicate the size of the proposed project and the primary material processed (e.g., 200 Th of coal).

_____	tph (of _____)	_____	MM Btu/hr
_____	scfm (of _____)	_____	MW: <input type="checkbox"/> electric
			<input type="checkbox"/> thermal
_____	acfm (of _____)	_____	Other:

- 10.a. Summarize the proposed work. List all activities or tasks planned at the location covered by this Environmental Questionnaire.

- 10.b Characterize the work site at this location (check all that apply).

☐ Existing Building (Indoors) ☐ Developed Site ☐ Undeveloped Site

11. List all other locations where work would be performed. (**Note: Submit a separate Environmental Questionnaire for each location.**)

12. Describe the objectives of the proposed project.

13. Identify the planned number of tests, the frequency of testing (e.g., tests per week), and the duration of tests by type (e.g., laboratory tests, pilot unit runs, etc.).

14. Identify all materials that would be used and produced by the project (materials can be grouped by category) and estimate their total quantities over the entire duration of the proposed project.

Materials Used (total quantity)		Materials Produced (total quantity)	
<input type="checkbox"/>	coal ()	<input type="checkbox"/>	wastewater ()
<input type="checkbox"/>	natural gas ()	<input type="checkbox"/>	air emissions ()
<input type="checkbox"/>	oil ()	<input type="checkbox"/>	solid waste ()
<input type="checkbox"/>	electricity ()	<input type="checkbox"/>	hazardous waste ()
<input type="checkbox"/>	water ()	<input type="checkbox"/>	salable by-
<input type="checkbox"/>	air ()		list and note
<input type="checkbox"/>	organic solvents ()		
<input type="checkbox"/>	others -- list and note quantity:	<input type="checkbox"/>	others -- list and note quantity:
<input type="checkbox"/>	None	<input type="checkbox"/>	None

B. PROPOSED PROJECT AND ITS ALTERNATIVES

1. List all alternative approaches considered to achieve the objectives described in A.11 and discuss the anticipated environmental effects of each. (Place the selected approach at the top of the list.)

2. Identify the environmental consequences of not implementing this project (e.g., emission increase).

C. PROJECT LOCATION

1. Provide a brief description of the project location (physical location, surrounding area, adjacent structures).

2. Attach a site plan or topographic map of the area that would be affected by the project and highlight (or otherwise identify) the specific location where the project would be performed.

CERTIFICATION BY PROPOSER

I hereby certify that the information provided herein is current, accurate, and complete as of the date shown immediately below.

DATE: _____
month day year

SIGNATURE: _____

TYPED NAME: _____

TITLE: _____

ORGANIZATION:_____

ATTACHMENT G

INTENT TO PROPOSE

ATTACHMENT G

INTENTION TO PROPOSE

SOLICITATION NUMBER: DE-RA26-01NT40891

WE _____ DO _____ DO NOT INTEND TO SUBMIT A PROPOSAL.

NAME AND ADDRESS OF FIRM OR ORGANIZATION (including Zip Code) AND POINT OF CONTACT.

TELEPHONE NO.: _____

FACSIMILE: _____

E-MAIL ADDRESS: _____

Unless otherwise stated in the solicitation, no other solicitation material should be returned if you do not intend to submit a proposal. Please return this form to:

MAIL TO: U.S. DEPARTMENT OF ENERGY
FEDERAL ENERGY TECHNOLOGY CENTER
ATTN: JAMES W. HUENNRICH
P.O. BOX 10940
626 COCHRANS MILL ROAD
PITTSBURGH, PA 15236-0940

VIA FACSIMILE: 412-386-6137

VIA E-MAIL: huennric@netl.doe.gov

ATTACHMENT H

COST PROPOSAL INSTRUCTIONS/FORMAT

COST PROPOSAL PREPARATION INSTRUCTIONS/FORMAT

- FOR: 1) Initial Phase.
- 2) Subsequent Phase(s). The level of detail necessary to establish estimated cost for subsequent phases.

A. GENERAL.

- (1) The Cost Proposal consists of the offeror's estimated costs to perform the desired work as set forth in the Statement of Work. As a minimum, the Cost Proposal shall contain the information specified below, **BROKEN DOWN ON A TASK BY TASK BASIS IN ACCORDANCE WITH THE OFFEROR'S FISCAL YEAR, ALONG WITH A SUMMARY OF THE TOTAL PROJECT COSTS.**

Since each Cost Proposal shall be evaluated to determine such matters as cost realism, reasonableness, understanding of the magnitude of effort, and probable cost to the Government, as well as being the basis for any necessary cost negotiation, it should be accurate, complete, and well documented.

COST INFORMATION IS NOT TO BE INCLUDED IN EITHER THE TECHNICAL PROPOSAL OR THE BUSINESS/MANAGEMENT PROPOSAL.

- (2) Modifications to Cost Proposal.

Any modification to the Cost Proposal shall clearly indicate the cost impact of the modification to the same level of detail shown in the original proposal.

Once the prospective offeror has been selected, the estimated costs submitted with the proposal shall not be subject to increase, except for changes in certified cost or pricing data submitted with the proposal, unless changes are made in the requirements of the request for proposal.

Furthermore, increases shall be considered only in regard to those requirements that are actually affected by the changes (whether they are initiated by the Government, or by the offeror), and then only to the extent that such increases will be considered separately, and not as part of a combined overall negotiation of the estimated cost and fee for the proposed award.

- (3) Certified Cost or Pricing Data.

In accordance with P.L. 87-653, as implemented by FAR 15.403, offerors may be required to certify that any cost or pricing data submitted is accurate, complete and current. In such an event, the required format for the certification can be found in FAR 15.406-2. The executed certification must be presented to the Contracting Officer after negotiations are concluded and before award can be made. FAR 15.407-1 contains applicable procedures where it is subsequently found that defective cost or pricing data was submitted.

In accordance with FAR 15.403, any offeror required to submit the above certification shall also be required to either submit, or arrange for the submission, of accurate, complete, and current cost or pricing data from his prospective subcontractors whose individual cost estimates exceed the limits established in FAR 15.404-3. This requirement may be waived under the circumstances as set forth in FAR 15.403-1.

Notwithstanding the above paragraphs, any successful offeror shall comply with applicable requirements of the "Subcontractor Cost or Pricing Data" clause of the award.

B. FORMAT AND CONTENT.

Cost and pricing data to be submitted by the offeror shall follow the format prescribed in Table 15-2 of the FAR or the alternate format specified below.

(1) General Instructions.

- a. Table of Contents: All forms, tables, or exhibits should be included and identified in the table of contents.
- b. Page Identification: All pages of the Cost Proposal, including forms, must be numbered. All forms, tables, or exhibits must be clearly identified.
- c. Rounding Off: Final monetary extensions shall be expressed in whole dollars only.

(2) Section One: Exhibits A through I

(3) Section Two: Additional Information

(4) Section Three: Exceptions and Deviations

C. PREPARATION OF EXHIBITS.

Exhibits A through I identified below shall be included in the cost proposal. Sample forms for these exhibits immediately follow these Proposal Preparation Instructions. Unless otherwise stated, the exact form need not be utilized; however, the information indicated both in this section and on the sample forms is required and must be submitted.

Cost information in the same format and level of detail is required for each subcontract or intercompany transfer estimated to exceed \$500,000. The trail from the subcontractor's project cost summaries to the offeror's Subcontracted Items line on Exhibit B-2 should be clear. Provide explanations for any differences between the amount proposed by the subcontractor to the offeror and the amounts proposed by the offeror to the Government for subcontract work.

(1) Exhibit A: Cost Proposal Cover Sheet.

The Cost Proposal Cover Sheet is to be completed by the offeror and all proposed subcontractors. Completion of the remaining exhibits (B through I) will provide supporting documentation for the proposed cost shown in Blocks 6A to 6C of the Cost Proposal Cover Sheet.

(2) Exhibit B-1: Summary of Cost Elements by Task and for Total Project.
Exhibit B-2: Summary of Cost Elements by Task for Offeror's Fiscal Year.

This is a two-part exhibit, with one Exhibit B-1 providing a summary of the total costs for each task AND the resulting total project costs. To support the Exhibit B-1 amounts, an individual Exhibit B-2 is required for each of the offeror's fiscal years in which the project is to be performed, and will provide the costs by task within each fiscal year. All of the Exhibit B-2s will roll up into the project totals shown on the Exhibit B-1.

(3) Exhibit C: Summary of Direct Materials and/or Equipment.

Provide a consolidated priced summary of individual material quantities. Indicate the basis for the proposed prices, i.e. written quotes, catalogue prices, prior invoices, shop estimates, etc. Where appropriate, identify the vendor and provide the date and information for multiple quotes.

(4) Exhibit D-1: Summary of Direct Labor.
Exhibit D-2: Summary of Direct Labor Hours by Task

This is a two-part exhibit in which the Exhibit D-1 provides the number of direct labor hours, the direct labor hourly rates, and the labor cost for each labor category proposed. As this information is required for each task by fiscal year, multiple forms are needed so that the total labor for each task matches the labor on the Exhibit B-2 task summaries.

On Exhibit D-2, provide the direct labor hours by task for each labor category for the prime contractor and all subcontractors and consultants. As an attachment to Exhibit D-2, provide a separate page that defines all labor category titles listed on the Exhibit D-2. This definition should discuss the duties normally performed by personnel having that title, and differentiate between levels of the same title (i.e., Senior Engineer vs. Junior Engineer, Technician I vs Technician II, etc.).

(5) Exhibit E: Summary of Travel.

Each trip must be itemized to identify the destination, number of travelers and length of the trip. Provide the rates used to estimate costs for airfare, lodging, meals and incidental expenses, and ground transportation.

(6) Exhibit F: Summary of Other Direct Costs.

The amount and basis for proposed direct costs not otherwise supported in the previous exhibits should be included here. For example, the number of hours and the hourly charge for computer time proposed might be included.

(7) Exhibit G-1: Summary of Indirect Expense Pools and Allocation Bases.
Exhibit G-2: Summary of Proposed Indirect Rates.

This is a two-part exhibit, with one Exhibit G-2 providing a summary of the indirect rates developed on all Exhibit G-1s. An individual Exhibit G-1 is required for EACH indirect cost proposed, e.g. material overhead, labor overhead, G&A expense, etc. Each Exhibit G-1 will contain the major pool expense groupings by line item and dollar amount for the offeror's most recently completed fiscal year, the current fiscal year, and an estimate for the next fiscal year. Similarly, the allocation base must be identified and the dollar amount provided to permit verification of the resulting indirect rates. The inclusive dates of the offeror's fiscal year must also be identified.

If agreement has been reached with another governmental organization for the use of provisional rates, a copy of the approved rate agreement can be submitted in lieu of Exhibit G-1, but an Exhibit G-2 is still required.

(8) Exhibit H: Summary of Escalation Factors.

This exhibit shall provide, by cost element, the escalation factors (percentages) applied to current costs to estimate the proposed costs for future fiscal years.

(9) Exhibit I: Accounting System Survey.

The Accounting System Survey provides information on the offeror's accounting system capabilities. This exhibit should be completed by an individual responsible for maintaining the offeror's accounting system. The form provided must be used.

D. ADDITIONAL INFORMATION.

(1) Estimating Procedure.

Provide a discussion of the offeror's estimating procedure and the rationale used in the development of the proposed costs. For effective negotiations, it is essential that there be a clear understanding of:

- a. The existing verifiable data.
- b. The judgmental factors applied in projecting from known data to the estimate.
- c. The contingencies used by the offeror in the proposed costs.

(2) Subcontracts.

The following information is required FOR EACH PLANNED SUBCONTRACT OF \$500,000 OR MORE:

- a. A brief description of the work to be subcontracted.
- b. The number of quotes solicited and received.
- c. The cost or price analysis performed by the offeror.
- d. Names and addresses of the subcontractors tentatively selected and the basis for their selection; i.e. low bidder, delivery schedule, technical competence.
- e. The offeror's rating of the subcontractor's competence; i.e. fair, good, excellent.
- f. Type of contract and estimated cost and fee or profit.
- g. Affiliation with the offeror, if any.
- h. Whether or not the subcontractor is a small business concern.
- i. The extent of subcontract supervision required.
- j. Whether or not the subcontractor is a minority business concern.

(3) Consultants.

If the offeror proposed the use of consultants, provide the following FOR EACH NAMED CONSULTANT:

- a. Resume.
- b. Identification of all cost elements included in the consultant's daily/hourly rates, plus a detailed explanation of any costs that would be charged over and above the rates.
- c. A signed consulting agreement between the offeror and the consultant.
- d. A signed statement from the consultant that the proposed rate is a "most favored customer rate", or the reason such a rate was not offered.
- e. A determination by the offeror that the rate proposed is comparable to the rates of other consultants doing similar types of work.

- f. The offeror shall prepare a technical evaluation of the need to employ a consultant, which shall include the consultant's technical ability to perform the desired work, along with a statement and reason that in-house resources are unavailable for performance of the effort.

In those cases where a consultant IS NOT NAMED but the offeror realizes a need will exist, the offeror shall support the proposed daily rate by supplying the information in (e) and (f) above.

(4) Cost Sharing, In-kind Contributions, etc.

If either cost sharing or cost participation is proposed, information should be provided concerning the proposed contractual arrangements. Examples of arrangements and the information required are as follows (however, note that arrangements are not limited to these four):

- a. Cash: Indicate the percentage proposed and identify the base to which the rate would be applied.
- b. Elimination of certain items from indirect pools: Identify which elements.
- c. Forbearance of fee/profit: State the standard percentage and identify the base to which the rate normally applies.
- d. In-kind contribution of facilities: Explain how the value of the contribution was calculated.

In any case, any proposed cost sharing method or value is subject to independent evaluation and audit by DOE in accordance with DEAR 917.70.

(5) Financial Condition.

- a. Provide a current balance sheet, profit and loss statement for all quarters reported on the current fiscal year, and an audited financial statement for each of the last 3 fiscal years.
- b. Describe fully any assets other than cash, accounts receivable, land, buildings, and equipment carried on the above balance sheet.
- c. State what percentage this proposed contract will represent of the offeror's estimated total business during the period of performance.
- d. Describe fully the impact of this project on the offeror's organization and any contingency, limitation, and conditions affecting availability of funds for this project.

(6) Company Compensation Policies.

The offeror shall briefly describe company compensation policies in the following areas (existing company publications may be furnished):

- a. Salary Increases:

- Merit
- Cost-of-Living
- General
- Other

- b. Fringe Benefits:

- Paid Absences (Vacations, Sick Leave, Holidays)
- Insurance Contributions
- Retirement
- Other

- c. Travel and Per Diem
- d. Relocation
- e. Bonuses & Other Employee Incentives
- f. Severance
- g. Overtime
- h. Shift Premium

(7) High Value Equipment.

Offerors are informed that when the use of High Value Equipment (in excess of \$10,000) is applicable to the procurement, the Government reserves the right to require the submission of the feasibility of lease versus purchase studies by the successful offeror.

(8) Use of ADPE.

If the use of automatic data processing equipment (ADPE) is proposed by the offeror, the Government reserves the right to require the preparation of (1) feasibility and (2) lease versus purchase studies by the successful offeror.

(9) The offeror shall provide any other supporting information deemed necessary in this section.

E. SUMMARY OF EXCEPTIONS AND DEVIATIONS.

The offeror shall identify and explain any exceptions, deviations, or conditional assumptions taken with respect to the requirements contained in these Cost Proposal Preparation Instructions.

Any exceptions or deviations taken must contain sufficient amplification and justification to permit evaluation. All benefits to the Government shall be explained for each exception taken. Such exceptions will not, of themselves, automatically cause a proposal to be termed unacceptable. A large number of exceptions, or one or more significant exceptions not providing benefit to the Government may, however, result in rejection of the proposal(s) as unacceptable.

CONTRACT PRICING PROPOSAL COVER SHEET		1. SOLICITATION / CONTRACT / MODIFICATION NO.		FETC APPROVED FORM	
2. NAME AND ADDRESS OF OFFEROR (Include ZIP Code)		3A. NAME AND TITLE OF OFFEROR'S POINT OF CONTACT		3B. TELEPHONE NO.	
		4. TYPE OF CONTRACT ACTION (Check)			
		A. NEW CONTRACT		D.	
		B. CHANGE ORDER		E.	
		C.	✓	F.	
5. TYPE OF CONTRACT: COST SHARE		6. PROPOSED COST (A + B = C)			
		A. COST TO DOE	B. COST-SHARE	C. TOTAL COST	
7. PLACE(S) AND PERIOD(S) OF PERFORMANCE					
8. List and reference the identification, quantity and total price proposed for each contract line item. A line item cost breakdown supporting this recap is required unless other-					
A. LINE ITEM NO.	B. IDENTIFICATION		C. QUANTITY	D. TOTAL PRICE	E. REF.
9. PROVIDE NAME, ADDRESS, AND TELEPHONE NUMBER FOR THE FOLLOWING (If available)					
A. CONTRACT ADMINISTRATION OFFICE			B. AUDIT OFFICE		
10. WILL YOU REQUIRE THE USE OF ANY GOVERNMENT PROPERTY IN THE PERFORMANCE OF THIS WORK? (If "yes," identify)			11A. DO YOU REQUIRE GOVERNMENT CONTRACT FINANCING TO PERFORM THIS PROPOSED CONTRACT? (If "Yes," complete Item 11B)		11B. TYPE OF FINANCING (✓ one) <input type="checkbox"/> ADVANCE <input type="checkbox"/> PROG <input type="checkbox"/> RESS <input type="checkbox"/> PAYMENTS <input type="checkbox"/> PAYMENTS <input type="checkbox"/> GUARANTEED LOANS
12. HAVE YOU BEEN AWARDED ANY CONTRACTS OR SUBCONTRACTS FOR THE SAME OR SIMILAR ITEMS WITHIN THE PAST 3 YEARS? (If "Yes," identify item(s), customer(s) and contract number(s)) <input type="checkbox"/> YES <input type="checkbox"/> NO			13. IS THIS PROPOSAL CONSISTENT WITH YOUR ESTABLISHED ESTIMATING AND ACCOUNTING PRACTICES AND PROCEDURES AND FAR PART 31, COST PRINCIPLES? (If "No," explain) <input type="checkbox"/> YES <input type="checkbox"/> NO		
14. COST ACCOUNTING STANDARDS BOARD (CASB) DATA (Public Law 91-379 as amended and FAR PART 30)					
A. WILL THIS CONTRACT ACTION BE SUBJECT TO CASB REGULATIONS? (If "No," explain in proposal) <input type="checkbox"/> YES <input type="checkbox"/> NO			B. HAVE YOU SUBMITTED A CASB DISCLOSURE STATEMENT (CASB DS-1 OR 2)? (If "Yes," specify in proposal the office to which submitted and if determined to be adequate) <input type="checkbox"/> YES <input type="checkbox"/> NO		
C. HAVE YOU BEEN NOTIFIED THAT YOU ARE OR MAY BE IN NON-COMPLIANCE WITH YOUR DISCLOSURE STATEMENT OR COST ACCOUNTING STANDARDS? (If "Yes," explain in proposal) <input type="checkbox"/> YES <input type="checkbox"/> NO			D. IS ANY ASPECT OF THIS PROPOSAL INCONSISTENT WITH YOUR DISCLOSED PRACTICES OR APPLICABLE COST ACCOUNTING STANDARDS? (If "Yes," explain in proposal) <input type="checkbox"/> YES <input type="checkbox"/> NO		
This proposal reflects our estimates and/or actual costs as of this date and conforms with the instructions in FAR 15.403-5(b)(1) and Table 15-2. By submitting this proposal, we grant the Contracting Officer or authorized representative(s) the right to examine, at any time before award, those records, which include books, documents, accounting procedures and practices, and other data, regardless of type and form or whether such supporting information is specifically referenced or included in the proposal as the basis for pricing, that will permit					
15. NAME AND TITLE (Type)			16. NAME OF FIRM		
17. SIGNATURE				18. DATE OF SUBMISSION	

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EXHIBIT A

GUIDE FOR CONTRACT PRICING PROPOSAL PREPARATION

The instructions and footnotes contained on pages 2, 3 and 4 of the SF-1411 are the basic criteria for proposal preparation. However, to highlight the areas of primary concern, the following is provided:

1. Quantities Proposed - All Categories: Provide the basis for the proposed quantities of material and labor hours such as current usage, prior history, engineering estimates, etc.
2. Material Prices: Explain the basis for the proposed prices, such as written quotes, catalogue prices, prior invoices, shop estimates, etc. Where appropriate, identify the source of the data and provide the date and information for multiple quotes.
3. Direct Labor Rates: Provide the basis for the proposed hourly rates. For example, the rates are actual rates or averages of actual rates for the labor category(s) proposed, paid as of a given date. If a factor is included to provide for known or anticipated increases, identify the factor and basis. If a factor for fringe benefits is included, e.g. vacations, it should be stated separately.
4. Overhead Rates: Explain how the rates were derived. Describe the methods of computation, including cost element breakdown, prior actual data, projected budgetary data, etc. to facilitate analysis of the pool of expenses and the base cost used to develop the rate. If agreement has been reached with another governmental organization for the use of provisional rates, submit a copy of the approved rate agreement.
5. Special Equipment: Provide information similar to that required for material (item 2 above).
6. Travel: Each trip must be itemized. List the destination, number of travelers, and length of the trip; and provide the rates used to estimate costs for airfare, lodging, meals, local transportation, and any incidentals.
7. Consultants: Indicate whether a firm or an individual is involved. Provide the hourly/daily rate along with the basis for the rate, and certify whether or not the proposed rate is the consultant's "most favored customer" rate. Furnish resumes or similar information regarding qualifications or experience. If travel or incidental expenses are to be charged, give the basis for these costs.
8. Other Direct Costs: The amount and basis for proposed costs not otherwise shown should be included here. For example, the number of hours and hourly charge for any computer time might be included.
9. General and Administrative (G&A) Expense: Provide information similar to that required for overhead costs (item 4 above).

EXHIBIT B-1

SUMMARY OF COST ELEMENTS BY TASK AND FOR TOTAL PROJECT

<u>COST ELEMENTS:</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Total Project</u>
1. Direct Material				
A) Purchased Parts				
B) Subcontracted Items				
C) Other				
Total Direct Materials				
2. Material Overhead				
3. Direct Labor				
4. Labor Overhead				
5. Special Testing				
6. Special Equipment				
7. Travel				
8. Consultants				
9. Other Direct Costs				
10. Total Direct Cost and Overhead				
11. General & Administrative Expense				
12. Facilities Capital Cost of Money				
13. Total Estimated Cost				
14. Fee				
15. Cost Sharing				
16. Total Estimated DOE Funds Required				

EXHIBIT B-2

SUMMARY OF COST ELEMENTS BY TASK FOR OFFEROR'S FISCAL YEAR 20_____

<u>COST ELEMENTS:</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Fiscal Year Total</u>
1. Direct Material				
A) Purchased Parts				
B) Subcontracted Items				
C) Other				
Total Direct Materials				
2. Material Overhead				
3. Direct Labor				
4. Labor Overhead				
5. Special Testing				
6. Special Equipment				
7. Travel				
8. Consultants				
9. Other Direct Costs				
10. Total Direct Cost and Overhead				
11. General & Administrative Expense				
12. Facilities Capital Cost of Money				
13. Total Estimated Cost				
14. Fee				
15. Cost Sharing				
16. Total Estimated DOE Funds Required				

NOTE: An Exhibit B-2 shall be provided for each of the offeror's fiscal years (or portion thereof) in which the project is to be performed.

EXHIBIT C

SUMMARY OF DIRECT MATERIALS AND/OR EQUIPMENT
BY TASK AND OFFEROR'S FISCAL YEAR

<u>Item Description</u>	<u>Quantity</u>	<u>Unit Cost</u>	<u>Total Cost</u>	<u>Basis for Proposed Costs</u>
		\$	\$	

Total Cost

IN THE "SOURCE OF COST DATA" COLUMN, IDENTIFY THE BASIS FOR THE PROPOSED TERMS, SUCH AS WRITTEN QUOTES, ENGINEERING ESTIMATES, PRIOR INVOICES, CATALOGUE PRICES, ETC.

WHERE APPROPRIATE, ALSO IDENTIFY THE VENDOR AND DATE THE INFORMATION WAS OBTAINED.

EXHIBIT D-1

SUMMARY OF DIRECT LABOR BY TASK AND OFFEROR'S FISCAL YEAR

TASK NO.: _____

FISCAL PERIOD: _____

<u>Labor Categories</u>	(1) <u>Proposed Hours</u>	(2) <u>Hourly Rate</u>	(1) X (2) <u>Labor Cost</u>
-------------------------	------------------------------	---------------------------	--------------------------------

NOTE: LIST EACH LABOR
CATEGORY BY NAME; DO NOT
USE CODES UNLESS AN
EXPLANATION IS PROVIDED TO
PERMIT DECODING.

TOTALS

\$

\$

Provide the above information for EACH TASK in EACH FISCAL PERIOD as provided in Exhibit B-2, so that the trail between these two exhibits is easy to follow.

EXHIBIT D-2

SUMMARY OF DIRECT LABOR HOURS BY TASK

<u>LABOR CATEGORY:</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Task No.</u>	<u>Total</u>
Prime Contractor:					
Category 1					
Category 2					
Category 3					
Etc.					
Subtotal	_____	_____	_____	_____	_____
Subcontractor A:					
Category 1					
Category 2					
Category 3					
Etc.					
Subtotal	_____	_____	_____	_____	_____
Subcontractor B:					
Category 1					
Category 2					
Category 3	_____	_____	_____	_____	_____
Etc.					
Subtotal	_____	_____	_____	_____	_____
Consultant A:					
Category 1					
Category 2					
Category 3					
Etc.					
Subtotal	_____	_____	_____	_____	_____
Grand Total	_____	_____	_____	_____	_____
	=====	=====	=====	=====	=====

EXHIBIT E

SUMMARY OF TRAVEL BY TASK AND OFFEROR'S FISCAL YEAR

<u>Fiscal Year</u>	<u>Destination</u>	<u>Round-trip Airfare</u>	<u>Ground Transportation</u>	<u>Daily Per Diem Rate</u>	<u>Daily Car Rental Rate</u>
------------------------	--------------------	-------------------------------	----------------------------------	--------------------------------	----------------------------------

IN THIS SECTION, PROVIDE THE RATES USED TO CALCULATE AIRFARE, GROUND
TRANSPORTATION, PER DIEM (WHICH INCLUDES SUBSISTENCE, MEALS AND INCIDENTAL
EXPENSES) AND CAR RENTAL.

<u>Task</u>	<u>Fiscal Year</u>	<u>Destination</u>	<u>Total Number of Trips/People/Days</u>	<u>Total Airfare</u>	<u>Total Per diem</u>	<u>Total Car Rental</u>	<u>Total Travel Cost</u>
-------------	------------------------	--------------------	--	--------------------------	---------------------------	---------------------------------	----------------------------------

EXHIBIT F

SUMMARY OF OTHER DIRECT COSTS BY TASK AND OFFEROR'S FISCAL YEAR

<u>Description of Cost</u>	<u>Number of Units/Hours/etc.</u>	<u>Rate per Unit/Hour/etc.</u>	<u>Total Cost</u>
	SPECIFY BOTH THE QUANTITY AND THE MEASURE; FOR EXAMPLE, 100 HOURS OR 2 DAYS.		
	<hr/>		\$ <hr/>

NOTE: THIS SAME FORMAT SHOULD BE USED TO
IDENTIFY ANY CONSULTANT COSTS PROPOSED. THE
NUMBER OF DAYS OR HOURS AND THE RATE CAN BE
ITEMIZED FOR EACH INDIVIDUAL CONSULTANT.

EXHIBIT G-1

SUMMARY OF INDIRECT EXPENSES

<u>Overhead Category</u>	<u>Previous Fiscal Year Base Pool FY: _____</u>	<u>Current Fiscal Year Base Pool FY: _____</u>	<u>Next Fiscal Year Base Pool FY: _____</u>
--------------------------	---	--	---

IMPORTANT NOTES:

- (1) SUBMIT A SEPARATE EXHIBIT G-1 FOR EACH OF YOUR COMPANY'S INDIRECT COST POOLS.
- (2) FOR EACH POOL, PROVIDE A BREAKDOWN BY EXPENSE ACCOUNT. SEE EXAMPLES ON THE FOLLOWING PAGES. EXAMPLES ARE PROVIDED SOLELY TO INDICATE AN

Base for Allocation:

_____ \$ _____

OFFEROR'S FISCAL YEAR: Beginning:_____ Ending:_____

EXHIBIT G-1

FOR EXAMPLE ONLY

SUMMARY OF INDIRECT EXPENSES

Overhead Category: Material Overhead

<u>Account Title</u>	<u>Previous Fiscal Year Base Pool FY: 20xx</u>	<u>Current Fiscal Year Base Pool* FY: 20xx</u>	<u>Next Fiscal Year Base Pool FY: 20xx</u>
Indirect Labor	\$ 823,833	\$ 864,327	\$ 1,125,500
Additional Compensation	31,000	34,392	41,225
Overtime Premium	5,010	5,263	5,500
Holidays	26,812	28,100	41,340
Sick Leave	20,768	22,018	33,750
Suggestion Awards	15	125	150
Vacations	43,607	45,734	56,250
Maintenance - Outside Services	165	192	200
Other Outside Services	78	76	75
Payroll Taxes	74,587	78,669	102,275
Travel	37,741	36,535	37,500
Dues and Subscriptions	651	651	651
Pension Fund	26,068	27,117	30,700
Operating Supplies	12,694	14,156	15,450
Stationery, Printing, & Operating Supplies	10,210	10,162	10,750
Telephone	19,184	20,322	21,500
Heat, Light, and Power	158,997	170,004	175,000
Depreciation	<u>79,554</u>	<u>79,554</u>	<u>79,554</u>
Total Expense Pool (A)	\$1,370,974	\$1,437,397	\$ 1,777,370
Allocation Base:			
Direct Materials (B)	\$25,878,940	\$28,466,900	\$31,313,600
Material Overhead Rate (A) / (B)	5.3%	5.0%	5.7%

* Includes two months budgetary estimate.

OFFEROR'S FISCAL YEAR: Beginning: April 1 Ending: March 31

EXHIBIT G-1

FOR EXAMPLE ONLY

SUMMARY OF INDIRECT EXPENSES

Overhead Category: Labor Overhead

<u>Account Title</u>	<u>Previous Fiscal Year Base Pool FY: 20xx</u>	<u>Current Fiscal Year Base Pool* FY: 20xx</u>	<u>Next Fiscal Year Base Pool FY: 20xx</u>
Indirect Payroll	\$ 264,909	\$ 256,213	\$ 260,000
Payroll Taxes	226,249	227,698	228,000
Vacation	118,710	119,872	120,000
Holidays	109,506	109,772	110,000
Sick Leave	49,962	50,013	50,000
Pensions	170,729	172,079	171,000
Employee Morale	4,073	4,987	5,000
Office Equipment	7,201	7,562	7,000
Depreciation	5,006	4,736	5,000
Subscriptions	1,397	1,488	1,500
Travel	20,557	19,724	22,000
Miscellaneous	1,513	1,987	2,000
Stationery	5,706	6,201	6,000
Reproduction	16,714	17,945	17,000
Maintenance	5,197	5,791	5,000
Rent	200,025	201,218	202,000
Telephone	10,538	10,712	11,000
Insurance	<u>93,786</u>	<u>90,758</u>	<u>102,000</u>
Total Expense Pool (A)	\$1,311,778	\$1,308,756	\$1,324,500
Allocation Base:			
Direct Labor (B)	\$2,398,541	\$2,460,872	\$2,336,000
Labor Overhead			
Rate (A) / (B)	54.7%	53.2%	56.7%

* Includes two months budgetary estimate.

OFFEROR'S FISCAL YEAR: Beginning: April 1 Ending: March 31

EXHIBIT G-1

FOR EXAMPLE ONLY

SUMMARY OF INDIRECT EXPENSES

Overhead Category: G&A Expense

<u>Account Title</u>	<u>Previous Fiscal Year Base Pool FY: 20xx</u>	<u>Current Fiscal Year Base Pool* FY: 20xx</u>	<u>Next Fiscal Year Base Pool FY: 20xx</u>
Payroll Taxes	\$ 54,909	\$ 56,213	\$ 56,800
Officers' Salaries	566,249	579,698	586,000
Indirect Salaries	1,407,100	1,458,724	1,460,500
Interest	63,506	63,772	60,500
Vacation	80,637	81,398	82,525
Holidays	49,962	50,013	49,500
Sick Leave	34,875	32,937	32,500
Contributions	15,743	13,289	15,000
Pensions	50,729	52,079	53,500
Office Equipment	30,541	27,942	26,750
Depreciation	30,557	29,724	29,000
Travel	62,513	64,987	67,000
Miscellaneous	30,706	41,201	43,250
Legal Fees	16,714	10,945	15,000
Accounting Fees	21,197	23,791	22,500
Computer	24,025	27,218	29,000
Rent	60,538	62,712	65,000
Advertising	13,786	10,758	12,500
Telephone	59,105	61,372	65,000
Insurance	<u>13,844</u>	<u>15,473</u>	<u>15,500</u>
Total Pool	\$ 2,687,236	\$ 2,764,246	\$ 2,787,325
Independent Research**	932,940	826,842	920,000
B&P	<u>743,902</u>	<u>526,209</u>	<u>700,000</u>
Total G&A Expenses	\$ 4,364,078	\$ 4,117,297	\$ 4,407,325
Less unallowables:			
Interest	63,506	63,772	60,500
Contributions	15,743	13,289	15,000
Advertising	<u>13,786</u>	<u>10,758</u>	<u>12,500</u>
Total Unallowables	<u>\$ 93,035</u>	<u>\$ 87,819</u>	<u>\$ 88,000</u>
Net Allowable			
G&A Expenses (A)	\$ 4,271,043	\$ 4,029,478	\$ 4,319,325
Allocation Base:			
Total Cost Input (B)	\$50,993,247	\$52,932,479	\$53,549,800
G&A Rate (A) / (B)	8.4%	7.6%	8.1%

* Includes two months budgetary estimate.

** If there are advance agreements, the explanation should so reference. Latest actual and estimated program expenditures and allocation bases should be provided.

OFFEROR'S FISCAL YEAR: Beginning: April 1 Ending: March 31

EXHIBIT G-2

SUMMARY OF PROPOSED INDIRECT RATES

<u>Indirect Rate Category</u>	<u>Fiscal Year 20xx</u>	<u>Fiscal Year 20xx</u>	<u>Fiscal Year 20xx</u>
-------------------------------	---------------------------------	---------------------------------	---------------------------------

NOTE: LIST ALL INDIRECT CATEGORIES
CONTAINED IN YOUR PROPOSAL (I.E.,
MATERIAL OVERHEAD, LABOR OVERHEAD,
FRINGE BENEFITS, G&A EXPENSE,
ETC.)

IDENTIFY PERCENTAGES OR FACTORS: DO NOT LIST
DOLLAR AMOUNTS.

IF THE "NEXT FISCAL YEAR" RATE FROM EXHIBIT G-1 DIFFERS FROM RATES SHOWN
ABOVE COVERING THE ENTIRE PERIOD OF PERFORMANCE, THEN ADDITIONAL EXHIBIT
G-1 EXPENSE POOL AND ALLOCATION BASE DATA MUST BE PREPARED SO THAT ALL
PROPOSED RATES ARE FULLY SUPPORTED.

EXHIBIT H

SUMMARY OF ESCALATION FACTORS/PERCENTAGES BY COST ELEMENT

<u>Cost Element</u>	<u>Fiscal Year</u>	<u>Fiscal Year</u>	<u>Fiscal Year</u>
---------------------	------------------------	------------------------	------------------------

NOTE: LIST EACH COST ELEMENT
(I.E., MATERIALS, LABOR,
TRAVEL, ETC.) THAT IS
ESCALATED AND THE APPLICABLE
RATE.

IDENTIFY PERCENTAGES OR FACTOR: DO NOT LIST
DOLLAR AMOUNTS.

EXHIBIT I

PRE-AWARD ACCOUNTING SYSTEM SURVEY

This accounting system review is designed to determine the adequacy and suitability of a contractor's accounting system and practices for accumulating costs under the type of Government instrument to be awarded. The Offeror(s) and each subcontractor whose total proposed costs exceed \$100,000 shall complete the attached accounting system survey. The form should be completed and signed by an individual familiar with the capabilities of the organization's accounting system.

Does the Accounting System provide for:	<u>YES</u>	<u>NO</u>
1. Proper segregation of direct costs from indirect costs?	___	___
2. Identification and accumulation of direct costs by contract? Under a job order cost system, subsidiary cost records for each individual contract are generally available?	___	___
3. A logical and consistent method for the allocation of indirect costs to intermediate and final cost objectives?	___	___
4. Accumulation of costs under general ledger control?	___	___
5. A timekeeping system that identifies employees' labor by intermediate or final cost objectives?	___	___
6. A labor distribution system that charges direct and indirect labor to the appropriate cost objectives?	___	___
7. Interim (at least monthly) determination of costs charged to a contract through routine posting of books of account?	___	___
8. Exclusion from costs charged to Government contracts of amounts which are not allowable pursuant to FAR Part 31, Contract Cost Principles and Procedures, or other contract provisions?	___	___
9. Identification of costs by contract line item if required by the proposed contract?	___	___

PRINTED NAME
AND TITLE: _____

SIGNATURE: _____ DATE: _____

ATTACHMENT I

INSTRUCTIONS FOR PREPARING THE STATEMENT OF WORK

INSTRUCTIONS FOR PREPARING THE STATEMENT OF WORK

The Department of Energy's National Energy Technology Laboratory uses a specific format for Statements of Work in its contracts. In broad solicitations such as this Program Research Development Announcement (PRDA), where the Government does not provide a Statement of Work, the Offeror is to provide one, which the Department of Energy will then use to generate the Statement of Work to be included in the contract. The following format includes Objectives, Success Criteria, Scope of Work, Tasks to Be Performed, Deliverables, and Briefings.

All proposals must contain a single, detailed Statement of Work that addresses how the project objectives will be met. The Statement of Work must contain a clear, concise description of all activities to be completed during project performance and follow the structure discussed below. This Statement of Work may be released to the public by DOE in whole or in part at any time. It is therefore required that it shall not contain proprietary data or confidential business information.

The Statement of Work is generally 3-4 pages in total for proposed work, and shall be included in Appendix A of the Volume II, Technical Proposal. Offerors shall prepare the Statement of Work in the following format:

TITLE OF WORK TO BE PERFORMED (Do Not Use Solicitation Title)

Insert title of work to be performed. Be concise and descriptive
(e.g., "Characterization of Radioactive Contamination
Inside Pipes With the Pipe Explorer™ System").

A. OBJECTIVES

Include one paragraph on the overall objectives of the work. Identify primary specific objectives and secondary objectives if applicable.

B. SUCCESS CRITERIA

This section must describe the specific measurement of the impact/benefit of the proposed technology, process or equipment. Also, describe quantitative criteria by which the progress of the proposed tasks are to be judged.

C. SCOPE OF WORK

This section should not exceed one page and should define the overall effort that will take place and the methodology to achieve the objectives of the proposed research and development effort.

D. TASKS TO BE PERFORMED

“Tasks, concisely written, should be provided in a logical sequence and should be divided into the phases of the project. This section provides a brief summary of the planned approach to this project.”

- Phase I - provide a short title (e.g., Proof of Principle testing)

Until the National Environmental Policy Act review and approval process is completed and notification is provided, the Contractor shall take no action that would have an adverse impact on the environment or limit the choice of reasonable alternatives to the proposed action.

Task I.1 -short title

(The Offeror shall provide a description of the work performed and not the detail approach.)

Task 1.2 -short title

Task 1.3 -short title

Task 1.4 -short title

Task 1.n -short title

Task 1.n+1 - Topical report

The Recipient shall prepare, a draft topical report on the technical progress of the project. This report shall follow guidelines set forth in the agreement and shall include discussion on topics including, but not limited to, results of any analyses, numerical simulations, and/or laboratory or field validations. These results shall be documented to allow validation. The report shall also include a discussion of other pertinent aspects of the project effort, including but not limited to: description of work performed, product/method inputs and outputs, product/method operating conditions, product efficiency, product/method longevity, product/method maintenance, and discussion detailing steps necessary to develop the technology into a marketable product. After review and comment by the appropriate DOE representatives, the recipient shall modify the report to become the Final Topical Report on the project activities to date. If the government elects not to continue with the remaining effort, the Topical Report will become the Final Report.

- Phase 2 - provide a short title (e.g., Bench-Scale Tests)

Until the National Environmental Policy Act review and approval process is completed and notification is provided, the Contractor shall take no action that would have an adverse impact on the environment or limit the choice of reasonable alternatives to the proposed action.

Task 2.1 -short title

(The Offeror shall provide a description of the work performed and not the detail approach).

Task 2.2 -short title

Task 2.3 -short title

Task 2.4 -short title

Task 2..n -short title

Task 2.n+1 -Final Report

The Recipient shall prepare, for review and comment, a draft final report on the technical progress of the entire project. This report shall follow guidelines set forth in the agreement and shall include discussion on topics including, but not limited to, results of any analysis, numerical simulations, and/or laboratory validations. These results shall be documented to allow validation. The report shall also include a discussion of other pertinent aspects of the project effort, including but not limited to: description of work performed, product inputs and outputs, product operating conditions, product efficiency, product longevity, product maintenance, and discussion detailing steps necessary to develop the technology into a marketable product. After review and comment by the appropriate DOE representatives, the recipient shall modify the report to become the Final

E. DELIVERABLES AS A RESULT OF THE STATEMENT OF WORK

The periodic, topical, and final reports shall be submitted in accordance with the attached "Reporting Requirements Checklist" and the instructions accompanying the Checklist.

In addition to the periodic, topical and final reports the Offeror shall provide the following:

- (a) Assessment and Analyses Report
- (b) Topical Report after each Phase completion

- (c) A deployment plan, with attachment C, as guidance must be developed and submitted to the DOE-COR within 90 days of award. This plan must be updated after each gate review. Technologies, in earlier stages of maturity will have less defined deployment plans.
- (d) Test Plan for Field Testing as required
- (e) Final Report required on completion of the contract
- (f) Provide a camera ready Innovative Technology Summary Report after completion of technology demonstration.

The Offeror shall provide a list of deliverables other than those identified on "Reporting Requirements Checklist" that will be delivered. These reports shall also be identified within the text of the Statement of Work, i.e.

Task 1.1 - (Report Description)
 Task 2.2 - (Report Description)
 Etc.

F. BRIEFINGS/TECHNICAL PRESENTATIONS (if applicable)

1. The contractor shall prepare detailed briefings for presentation to the Contracting Officer's Representative (COR) at Morgantown, West Virginia or at a location designated by the COR. The briefings shall be given by the contractor to explain the plans, progress, and results of the project effort. The first briefing shall be presented within 60 days after award. The contractor shall present a briefing at least 45 days before completion of any Phase effort and a final briefing at least 45 days before the award is due to expire.
2. The contractor shall prepare detailed briefings for presentation at the SCFA Mid-Year Meeting generally held in Atlanta, GA (or another selected site which will be determined later). This meeting will discuss the progress made during the 12 month period and the status of the project.
3. The contractor shall attend at Gate and Peer reviews which includes providing written response to comments made at those reviews.

NOTE: Each proposal will be prepared for a specific subtopic for example:

- 1) Ground Water Technologies.**
- 2) Soil Characterization.**
- 3) Contaminant Fate and Transport for Risk-Based Remedial Decision Making.**

If the Offeror's technology is applicable to more than one subtopic, it is required that the Offeror submit a separate proposal for each subtopic. This will help in the evaluation of the proposals because there will be a separate team for each subtopic to perform the technical evaluation.

**SECTION K - REPRESENTATIONS, CERTIFICATIONS, AND OTHER
STATEMENTS OF OFFERORS OR QUOTERS**

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**SECTION K - REPRESENTATIONS, CERTIFICATIONS, AND OTHER
STATEMENTS OF OFFERORS OR QUOTERS**

**K.1 52.203-11 CERTIFICATION AND DISCLOSURE REGARDING PAYMENTS TO
INFLUENCE CERTAIN FEDERAL TRANSACTIONS. (APR 1991)**

- (a) The definitions and prohibitions contained in the clause, at FAR 52.203-12, Limitation on Payments to Influence Certain Federal Transactions, included in this solicitation, are hereby incorporated by reference in paragraph (b) of this certification.
- (b) The offeror, by signing its offer, hereby certifies to the best of his or her knowledge and belief that on or after December 23, 1989 -
 - (1) No Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress on his or her behalf in connection with the awarding of any Federal contract, the making of any Federal grant, the making of any Federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment or modification of any Federal contract, grant, loan, or cooperative agreement;
 - (2) If any funds other than Federal appropriated funds (including profit or fee received under a covered Federal transaction) have been paid, or will be paid, to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress on his or her behalf in connection with this solicitation, the offeror shall complete and submit, with its offer, OMB standard form LLL, Disclosure of Lobbying Activities, to the Contracting Officer; and
 - (3) He or she will include the language of this certification in all subcontract awards at any tier and require that all recipients of subcontract awards in excess of \$100,000 shall certify and disclose accordingly.
- (c) Submission of this certification and disclosure is a prerequisite for making or entering into this contract imposed by section 1352, title 31, United States Code. Any person who makes an expenditure prohibited under this provision or who fails to file or amend the disclosure form to be filed or amended by this provision, shall be subject to a civil penalty of not less than \$10,000, and not more than \$100,000, for each such failure.

K.2 52.204-3 TAXPAYER IDENTIFICATION. (OCT 1998)

(a) Definitions.

"Common parent," as used in this provision, means that corporate entity that owns or controls an affiliated group of corporations that files its Federal income tax returns on a consolidated basis, and of which the offeror is a member.

"Taxpayer Identification Number (TIN)," as used in this provision, means the number required by the Internal Revenue Service (IRS) to be used by the offeror in reporting income tax and other returns. The TIN may be either a Social Security Number or an Employer Identification Number.

(b) All offerors must submit the information required in paragraphs (d) through (f) of this provision to comply with debt collection requirements of 31 U.S.C. 7701(c) and 3325(d), reporting requirements of 26 U.S.C. 6041, 6041A, and 6050M, and implementing regulations issued by the IRS. If the resulting contract is subject to the payment reporting requirements described in Federal Acquisition Regulation (FAR) 4.904, the failure or refusal by the offeror to furnish the information may result in a 31 percent reduction of payments otherwise due under the contract.

(c) The TIN may be used by the Government to collect and report on any delinquent amounts arising out of the offeror's relationship with the Government (31 U.S.C. 7701(c)(3)). If the resulting contract is subject to the payment reporting requirements described in FAR 4.904, the TIN provided hereunder may be matched with IRS records to verify the accuracy of the offeror's TIN.

(d) Taxpayer Identification Number (TIN).

☐ TIN: _____

☐ TIN has been applied for.

☐ TIN is not required because:

☐ Offeror is a nonresident alien, foreign corporation, or foreign partnership that does not have income effectively connected with the conduct of a trade or business in the United States and does not have an office or place of business or a fiscal paying agent in the United States;

☐ Offeror is an agency or instrumentality of a foreign government;

☐ Offeror is an agency or instrumentality of the Federal Government.

(e) Type of organization.

- ☐ Sole proprietorship;
- ☐ Partnership;
- ☐ Corporate entity (not tax-exempt);
- ☐ Corporate entity (tax-exempt);
- ☐ Government entity (Federal, State, or local);
- ☐ Foreign government;
- ☐ International organization per 26 CFR 1.6049-4;
- ☐ Other _____

(f) Common parent.

- ☐ Offeror is not owned or controlled by a common parent as defined in paragraph (a) of this provision.

☐ Name and TIN of common parent:

Name: _____

TIN: _____

K.3 52.204-5 WOMEN-OWNED BUSINESS (OTHER THAN SMALL BUSINESS (MAY 1999))

- (a) Definition. Women-owned business concern, as used in this provision, means a concern that is at least 51 percent owned by one or more women; or in the case of any publicly owned business, at least 51 percent of its stock is owned by one or more women; and whose management and daily business operations are controlled by one or more women.
- (b) Representation. *[Complete only if the offeror is a women-owned business concern and has not represented itself as a small business concern in paragraph (b)(1) of FAR 52.219-1, Small Business Program Representations, of this solicitation.]* The offeror represents that it ☐ is a women-owned business concern.

K.4 52.209-5 CERTIFICATION REGARDING DEBARMENT, SUSPENSION, PROPOSED DEBARMENT, AND OTHER RESPONSIBILITY MATTERS. (MAR 1996)

(a) (1) The Offeror certifies, to the best of its knowledge and belief, that -

(i) The Offeror and/or any of its Principals -

- (A) Are ☐ are not ☐ presently debarred, suspended, proposed for debarment, or declared ineligible for the award of contracts by any Federal agency;

- (B) Have ☐ have not ☐, within a three-year period preceding this offer, been convicted of or had a civil judgment rendered against them for: commission of fraud or a criminal offense in connection with obtaining, attempting to obtain, or performing a public (Federal, state, or local) contract or subcontract; violation of Federal or state antitrust statutes relating to the submission of offers; or commission of embezzlement, theft, forgery, bribery, falsification or destruction of records, making false statements, tax evasion, or receiving stolen property; and
 - (C) Are ☐ are not ☐ presently indicted for, or otherwise criminally or civilly charged by a governmental entity with, commission of any of the offenses enumerated in subdivision (a)(1)(i)(B) of this provision.
- (ii) The Offeror has ☐ has not ☐, within a three-year period preceding this offer, had one or more contracts terminated for default by any Federal agency.
- (2) "Principals," for the purposes of this certification, means officers; directors; owners; partners; and, persons having primary management or supervisory responsibilities within a business entity (e.g., general manager; plant manager; head of a subsidiary, division, or business segment, and similar positions).

This Certification Concerns a Matter Within the Jurisdiction of an Agency of the United States and the Making of a False, Fictitious, or Fraudulent Certification May Render the Maker Subject to Prosecution Under Section 1001, Title 18, United States Code.

- (b) The Offeror shall provide immediate written notice to the Contracting Officer if, at any time prior to contract award, the Offeror learns that its certification was erroneous when submitted or has become erroneous by reason of changed circumstances.
- (c) A certification that any of the items in paragraph (a) of this provision exists will not necessarily result in withholding of an award under this solicitation. However, the certification will be considered in connection with a determination of the Offeror's responsibility. Failure of the Offeror to furnish a certification or provide such additional information as requested by the Contracting Officer may render the Offeror nonresponsible.
- (d) Nothing contained in the foregoing shall be construed to require establishment of a system of records in order to render, in good faith, the certification required by paragraph (a) of this provision. The knowledge and information of an Offeror is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.
- (e) The certification in paragraph (a) of this provision is a material representation of fact upon which reliance was placed when making award. If it is later determined that the Offeror knowingly rendered an erroneous certification, in addition to other remedies available to the Government, the Contracting Officer may terminate the contract resulting from this solicitation for default.

K.5 52.215-6 PLACE OF PERFORMANCE. (OCT 1997)

- (a) The offeror or respondent, in the performance of any contract resulting from this solicitation, ___ intends, ___ does not intend (check applicable block) to use one or more plants or facilities located at a different address from the address of the offeror or respondent as indicated in this proposal or response to request for information.
- (b) If the offeror or respondent checks "intends" in paragraph (a) of this provision, it shall insert in the following spaces the required information:

PLACE OF PERFORMANCE
STREET ADDRESS, CITY
STATE, COUNTY, ZIP CODE

NAME AND ADDRESS OF OWNER
AND OPERATOR OF THE PLANT
OR FACILITY IF OTHER THAN
OFFEROR OR RESPONDENT

**K.6 52.219-1 SMALL BUSINESS PROGRAM REPRESENTATIONS. (OCT 2000) --
ALTERNATE I (OCT 2000)**

- (a) (1) The standard industrial classification (NAICS) code for this acquisition is [insert NAICS code].
- (2) The small business size standard is [insert size standard].
- (3) The small business size standard for a concern which submits an offer in its own name, other than on a construction or service contract, but which proposes to furnish a product which it did not itself manufacture, is 500 employees.
- (b) Representations. (1) The offeror represents as part of its offer that it [] is, [] is not a small business concern.
- (2) (Complete only if the offeror represented itself as a small business concern in paragraph (b)(1) of this provision.) The offeror represents, for general statistical purposes, as part of its offer that it (___) is, (___) is not a small disadvantaged business concern as defined in 13 CFR 124.1002.
- (3) (Complete only if the offeror represented itself as a small business concern in paragraph (b)(1) of this provision.) The offeror represents as part of its offer that it [] is, [] is not a women-owned small business concern.
- (4) [Complete only if the offeror represented itself as a small business concern in paragraph (b)(1) of this provision.] The offeror represents as part of its offer that it [] is, [] is not a veteran-owned small business concern.

- (5) [Complete only if the offeror represented itself as a veteran-owned small business concern in paragraph (b)(4) of this provision.] The offeror represents as part of its offer that it ☐ is, ☐ is not a service-disabled veteran-owned small business concern.
- (6) [Complete only if offeror represented itself as a small business concern in paragraph (b)(1) of this provision.] The offeror represents, as part of its offer, that--
- (i) It ☐ is, ☐ is not a HUBZone small business concern listed, on the date of this representation, on the List of Qualified HUBZone Small Business Concerns maintained by the Small Business Administration, and no material change in ownership and control, principal office, or HUBZone employee percentage has occurred since it was certified by the Small Business Administration in accordance with 13 CFR Part 126; and
 - (ii) It ☐ is, ☐ is not a joint venture that complies with the requirements of 13 CFR Part 126, and the representation in paragraph (b)(6)(i) of this provision is accurate for the HUBZone small business concern or concerns that are participating in the joint venture. [The offeror shall enter the name or names of the HUBZone small business concern or concerns that are participating in the joint venture: _____.] Each HUBZone small business concern participating in the joint venture shall submit a separate signed copy of the HUBZone representation.

(c) Definitions. As used in this provision --

"Small business concern," means a concern, including its affiliates, that is independently owned and operated, not dominant in the field of operation in which it is bidding on Government contracts, and qualified as a small business under the criteria in 13 CFR Part 121 and the size standard in paragraph (a) of this provision.

"Service-disabled veteran-owned small business concern"--

(1) Means a small business concern--

- (i) Not less than 51 percent of which is owned by one or more service-disabled veterans or, in the case of any publicly owned business, not less than 51 percent of the stock of which is owned by one or more service-disabled veterans; and
 - (ii) The management and daily business operations of which are controlled by one or more service-disabled veterans or, in the case of a veteran with permanent and severe disability, the spouse or permanent care giver of such veteran.
- (2) Service-disabled veteran means a veteran, as defined in 38 U.S.C. 101(2), with a disability that is service-connected, as defined in 38 U.S.C. 101(16).

"Women-owned small business concern," as used in this provision, means a small business concern -

- (1) Which is at least 51 percent owned by one or more women or, in the case of any publicly owned business, at least 51 percent of the stock of which is owned by one or more women; and
 - (2) Whose management and daily business operations are controlled by one or more women.
- (d) Notice. (1) If this solicitation is for supplies and has been set aside, in whole or in part, for small business concerns, then the clause in this solicitation providing notice of the set-aside contains restrictions on the source of the end items to be furnished.
- (2) Under 15 U.S.C. 645(d), any person who misrepresents a firm's status as a small HUBZone small, small disadvantaged, or women-owned small business concern in order to obtain a contract to be awarded under the preference programs established pursuant to section 8(a), 8(d), 9, or 15 of the Small Business Act or any other provision of Federal law that specifically references section 8(d) for a definition of program eligibility, shall --
- (i) Be punished by imposition of fine, imprisonment, or both;
 - (ii) Be subject to administrative remedies, including suspension and debarment; and
 - (iii) Be ineligible for participation in programs conducted under the authority of the Act.

K.7 52.219-22 SMALL DISADVANTAGED BUSINESS STATUS. (OCT 1999)

- (a) General. This provision is used to assess an offeror's small disadvantaged business status for the purpose of obtaining a benefit on this solicitation. Status as a small business and status as a small disadvantaged business for general statistical purposes is covered by the provision at FAR 52.219-1, Small Business Program Representation.
- (b) Representations.
- (1) General. The offeror represents, as part of its offer, that it is a small business under the size standard applicable to this acquisition; and either--
- (i) It has received certification by the Small Business Administration as a small disadvantaged business concern consistent with 13 CFR 124, Subpart B; and
 - (A) No material change in disadvantaged ownership and control has occurred since its certification;

- (B) Where the concern is owned by one or more disadvantaged individuals, the net worth of each individual upon whom the certification is based does not exceed \$750,000 after taking into account the applicable exclusions set forth at 13 CFR 124.104(c)(2); and
 - (C) It is identified, on the date of its representation, as a certified small disadvantaged business concern in the database maintained by the Small Business Administration (PRO-Net); or
- (ii) It has submitted a completed application to the Small Business Administration or a Private Certifier to be certified as a small disadvantaged business concern in accordance with 13 CFR 124, Subpart B, and a decision on that application is pending, and that no material change in disadvantaged ownership and control has occurred since its application was submitted.
- (2) For Joint Ventures. The offeror represents, as part of its offer, that it is a joint venture that complies with the requirements at 13 CFR 124.1002(f) and that the representation in paragraph (b)(1) of this provision is accurate for the small disadvantaged business concern that is participating in the joint venture. [The offeror shall enter the name of the small disadvantaged business concern that is participating in the joint venture: []
- (c) Penalties and Remedies. Anyone who misrepresents any aspects of the disadvantaged status of a concern for the purposes of securing a contract or subcontract shall:
- (1) Be punished by imposition of a fine, imprisonment, or both;
 - (2) Be subject to administrative remedies, including suspension and debarment; and
 - (3) Be ineligible for participation in programs conducted under the authority of the Small Business Act.

K.8 52.222-22 PREVIOUS CONTRACTS AND COMPLIANCE REPORTS (FEB 1999)

The offeror represents that -

- (a) It (___) has, (___) has not participated in a previous contract or subcontract subject to the Equal Opportunity clause of this solicitation;
- (b) It (___) has, (___) has not filed all required compliance reports; and
- (c) Representations indicating submission of required compliance reports, signed by proposed subcontractors, will be obtained before subcontract awards.

K.9 52.222-25 AFFIRMATIVE ACTION COMPLIANCE (APR 1984)

The offeror represents that -

- (a) It ___ has developed and has on file, ___ has not developed and does not have on file, at each establishment, affirmative action programs required by the rules and regulations of the Secretary of Labor (41 CFR 60-1 and 60-2); or
- (b) It ___ has not previously had contracts subject to the written affirmative action programs requirement of the rules and regulations of the Secretary of Labor.

K.10 52.223-13 CERTIFICATION OF TOXIC CHEMICAL RELEASE REPORTING (OCT 2000)

(a) Submission of this certification is a prerequisite for making or entering into this contract imposed by Executive Order 12969, August 8, 1995.

(b) By signing this offer, the offeror certifies that -

- (1) As the owner or operator of facilities that will be used in the performance of this contract that are subject to the filing and reporting requirements described in section 313 of the Emergency Planning and Community Right-to-Know Act of 1986 (EPCRA) (42 U.S.C. 11023) and section 6607 of the Pollution Prevention Act of 1990 (PPA) (42 U.S.C. 13106), the offeror will file and continue to file for such facilities for the life of the contract the Toxic Chemical Release Inventory Form (Form R) as described in sections 313(a) and (g) of EPCRA and section 6607 of PPA; or
- (2) None of its owned or operated facilities to be used in the performance of this contract is subject to the Form R filing and reporting requirements because each such facility is exempt for at least one of the following reasons: (*Check each block that is applicable.*)
 - ___ (i) The facility does not manufacture, process, or otherwise use any toxic chemicals listed under section 313(c) of EPCRA, 42 U.S.C. 11023(c);
 - ___ (ii) The facility does not have 10 or more full-time employees as specified in section 313(b)(1)(A) of EPCRA, 42 U.S.C. 11023(b)(1)(A);
 - ___ (iii) The facility does not meet the reporting thresholds of toxic chemicals established under section 313(f) of EPCRA, 42 U.S.C. 11023(f) (including the alternate thresholds at 40 CFR 372.27, provided an appropriate certification form has been filed with EPA);
 - ___ (iv) The facility does not fall within Standard Industrial Classification Code (SIC) major groups 20 through 39 or their corresponding North American Industry Classification System (NAICS) sectors 31 through 33; or

- ___ (v) The facility is not located within any State of the United States, the District of Columbia, the Commonwealth of Puerto Rico, Guam, American Samoa, the United States Virgin Islands, the Northern Mariana Islands, or any other territory or possession over which the United States has jurisdiction.

K.11 52.226-2 HISTORICALLY BLACK COLLEGE OR UNIVERSITY AND MINORITY INSTITUTION REPRESENTATION (MAY 1997)

- (a) Definitions. As used in this provision -

"Historically Black College or University" means an institution determined by the Secretary of Education to meet the requirements of 34 CFR 608.2. For the Department of Defense, the National Aeronautics and Space Administration, and the Coast Guard, the term also includes any nonprofit research institution that was an integral part of such a college or university before November 14, 1986.

"Minority Institution" means an institution of higher education meeting the requirements of Section 1046(3) of the Higher Education Act of 1965 (20 U.S.C. 1135d-5(3)) which, for the purpose of this provision, includes a Hispanic-serving institution of higher education as defined in Section 316(b)(1) of the Act (20 U.S.C. 1059c(b)(1)).

- (b) Representation. The offeror represents that it -

___ is ___ is not a Historically Black College or University;

___ is ___ is not a Minority Institution.

K.12 52.227-15 REPRESENTATION OF LIMITED RIGHTS DATA AND RESTRICTED COMPUTER SOFTWARE (MAY 1999)

- (a) This solicitation sets forth the work to be performed if a contract award results, and the Government's known delivery requirements for data (as defined in FAR 27.401). Any resulting contract may also provide the Government the option to order additional data under the Additional Data Requirements clause at 52.227-16 of the FAR, if included in the contract. Any data delivered under the resulting contract will be subject to the Rights in Data--General clause at 52.227-14 that is to be included in this contract. Under the latter clause, a Contractor may withhold from delivery data that qualify as limited rights data or restricted computer software, and deliver form, fit, and function data in lieu thereof. The latter clause also may be used with its Alternates II and/or III to obtain delivery of limited rights data or restricted computer software, marked with limited rights or restricted rights notices, as appropriate. In addition, use of Alternate V with this latter clause provides the Government the right to inspect such data at the Contractor's facility.

- (b) As an aid in determining the Government's need to include Alternate II or Alternate III in the clause at 52.227-14, Rights in Data--General, the offeror shall complete paragraph (c) of this provision to either state that none of the data qualify as limited rights data or restricted computer software, or identify, to the extent feasible, which of the data qualifies as limited rights data or restricted computer software. Any identification of limited rights data or restricted computer software in the offeror's response is not determinative of the status of such data should a contract be awarded to the offeror.
- (c) The offeror has reviewed the requirements for the delivery of data or software and states [offeror check appropriate block] --

_____ None of the data proposed for fulfilling such requirements qualifies as limited rights data or restricted computer software.

_____ Data proposed for fulfilling such requirements qualify as limited rights data or restricted computer software and are identified as follows:

Note: "Limited rights data" and "Restricted computer software" are defined in the contract clause entitled "Rights in Data--General."

K.13 52.230-1 COST ACCOUNTING STANDARDS NOTICES AND CERTIFICATION
(JUN 2000)

Note: This notice does not apply to small businesses or foreign governments. This notice is in three parts, identified by Roman numerals I through III.

Offerors shall examine each part and provide the requested information in order to determine Cost Accounting Standards (CAS) requirements applicable to any resultant contract.

If the offeror is an educational institution, Part II does not apply unless the contemplated contract will be subject to full or modified CAS coverage pursuant to 48 CFR 9903.201-2(c)(5) or 9903.201-2(c)(6), respectively.

I. DISCLOSURE STATEMENT - COST ACCOUNTING PRACTICES AND CERTIFICATION

- (a) Any contract in excess of \$500,000 resulting from this solicitation will be subject to the requirements of the Cost Accounting Standards Board (48 CFR Chapter 99), except for those contracts which are exempt as specified in 48 CFR 9903.201-1.

- (b) Any offeror submitting a proposal which, if accepted, will result in a contract subject to the requirements of 48 CFR Chapter 99 must, as a condition of contracting, submit a Disclosure Statement as required by 48 CFR 9903.202. When required, the Disclosure Statement must be submitted as a part of the offeror's proposal under this solicitation unless the offeror has already submitted a Disclosure Statement disclosing the practices used in connection with the pricing of this proposal. If an applicable Disclosure Statement has already been submitted, the offeror may satisfy the requirement for submission by providing the information requested in paragraph (c) of Part I of this provision.

Caution: In the absence of specific regulations or agreement, a practice disclosed in a Disclosure Statement shall not, by virtue of such disclosure, be deemed to be a proper, approved, or agreed-to practice for pricing proposals or accumulating and reporting contract performance cost data.

(c) Check the appropriate box below:

☐ (1) Certificate of Concurrent Submission of Disclosure Statement. The offeror hereby certifies that, as a part of the offer, copies of the Disclosure Statement have been submitted as follows:

(i) Original and one copy to the cognizant Administrative Contracting Officer (ACO) or cognizant Federal agency official authorized to act in that capacity (Federal official), as applicable; and

(ii) One copy to the cognizant Federal auditor.

(Disclosure must be on Form No. CASB DS-1 or CASB DS-2, as applicable. Forms may be obtained from the cognizant ACO or Federal official and/or from the loose-leaf version of the Federal Acquisition Regulation.)

Date of Disclosure Statement: _____

Name and Address of Cognizant ACO or Federal Official Where Filed:

The offeror further certifies that the practices used in estimating costs in pricing this proposal are consistent with the cost accounting practices disclosed in the Disclosure Statement.

- [] (2) Certificate of Previously Submitted Disclosure Statement. The offeror hereby certifies that the required Disclosure Statement was filed as follows:

Date of Disclosure Statement: _____

Name and Address of Cognizant ACO or Federal Official Where Filed:

The offeror further certifies that the practices used in estimating costs in pricing this proposal are consistent with the cost accounting practices disclosed in the applicable Disclosure Statement.

- [] (3) Certificate of Monetary Exemption. The offeror hereby certifies that the offeror, together with all divisions, subsidiaries, and affiliates under common control, did not receive net awards of negotiated prime contracts and subcontracts subject to CAS totaling \$50 million or more in the cost accounting period immediately preceding the period in which this proposal was submitted. The offeror further certifies that if such status changes before an award resulting from this proposal, the offeror will advise the Contracting Officer immediately.
- [] (4) Certificate of Interim Exemption. The offeror hereby certifies that (i) the offeror first exceeded the monetary exemption for disclosure, as defined in (3) of this subsection, in the cost accounting period immediately preceding the period in which this offer was submitted and (ii) in accordance with 48 CFR 9903.202-1, the offeror is not yet required to submit a Disclosure Statement. The offeror further certifies that if an award resulting from this proposal has not been made within 90 days after the end of that period, the offeror will immediately submit a revised certificate to the Contracting Officer, in the form specified under subparagraph (c)(1) or (c)(2) of Part I of this provision, as appropriate, to verify submission of a completed Disclosure Statement.

Caution: Offerors currently required to disclose because they were awarded a CAS-covered prime contract or subcontract of \$50 million or more in the current cost accounting period may not claim this exemption (4). Further, the exemption applies only in connection with proposals submitted before expiration of the 90-day period following the cost accounting period in which the monetary exemption was exceeded.

II. COST ACCOUNTING STANDARDS - ELIGIBILITY FOR MODIFIED CONTRACT COVERAGE

If the offeror is eligible to use the modified provisions of 48 CFR 9903.201-2(b) and elects to do so, the offeror shall indicate by checking the box below. Checking the box below shall mean that the resultant contract is subject to the Disclosure and Consistency of Cost Accounting Practices clause in lieu of the Cost Accounting Standards clause.

The offeror hereby claims an exemption from the Cost Accounting Standards clause under the provisions of 48 CFR 9903.201-2(b) and certifies that the offeror is eligible for use of the Disclosure and Consistency of Cost Accounting Practices clause because during the cost accounting period immediately preceding the period in which this proposal was submitted, the offeror received less than \$50 million in awards of CAS-covered prime contracts and subcontracts. The offeror further certifies that if such status changes before an award resulting from this proposal, the offeror will advise the Contracting Officer immediately.

Caution: An offeror may not claim the above eligibility for modified contract coverage if this proposal is expected to result in the award of a CAS-covered contract of \$50 million or more or if, during its current cost accounting period, the offeror has been awarded a single CAS-covered prime contract or subcontract of \$50 million or more.

III. ADDITIONAL COST ACCOUNTING STANDARDS APPLICABLE TO EXISTING CONTRACTS

The offeror shall indicate below whether award of the contemplated contract would, in accordance with subparagraph (a)(3) of the Cost Accounting Standards clause, require a change in established cost accounting practices affecting existing contracts and subcontracts.

☐ yes ☐ no

K.14 COMPLIANCE WITH VETERANS EMPLOYMENT REPORTING REQUIREMENTS (JUNE 1999)

- (a) The Offeror represents that, if it is subject to the reporting requirements of 38 U.S.C. 4212(d) (i.e. the VETS-100 report required by the Federal Acquisition Regulation clause 52.222-37, Employment Reports on Disabled Veterans and Veterans of the Vietnam Era), it has ☐, has not ☐ submitted the most recent report required by 38 U.S.C. 4212(d).
- (b) An Offeror who checks "has not" may not be awarded a contract until the required reports are filed. (31 U.S.C. 1354)

K.15 SIGNATURE/CERTIFICATION (MAR 1999)

By signing below, the offeror certifies, under penalty of law, that the representations and certifications are accurate, current, and complete. The offeror further certifies that it will notify the Contracting Officer of any changes to these representations and certifications. The representations and certification made by the offeror, as contained herein, concern matters within the jurisdiction of an agency of the United States and the making of a false, fictitious, or fraudulent representation or certification may render the maker subject to prosecution under Title 18, United States Code, Section 1001.

Signature of the Officer or Employee
Responsible for the Offer

Date of Execution

Typed Name and Title of the Officer or Employee
Responsible for the Offer

Name and Address of Organization:

Solicitation Number: _____

**SECTION L - INSTRUCTIONS, CONDITIONS, AND NOTICES TO
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SECTION L - INSTRUCTIONS, CONDITIONS, AND NOTICES TO OFFERORS OR QUOTERS

L.1 CONSECUTIVE NUMBERING (JAN 1999)

Due to automated procedures employed in formulating this document, clauses and provisions contained within it may not always be consecutively numbered.

L.2 52.252-1 SOLICITATION PROVISIONS INCORPORATED BY REFERENCE (FEB 1998)

This solicitation incorporates one or more solicitation provisions by reference, with the same force and effect as if they were given in full text. Upon request, the Contracting Officer will make their full text available. The offeror is cautioned that the listed provisions may include blocks that must be completed by the offeror and submitted with its quotation or offer. In lieu of submitting the full text of those provisions, the offeror may identify the provision by paragraph identifier and provide the appropriate information with its quotation or offer. Also, the full text of a solicitation provision may be accessed electronically at these address(es):

<http://www.arnet.gov/far/index.html>

<http://www.pr.doe.gov/dear.html>

L.3 CONTENT OF RESULTING CONTRACT (NOV 1998)

Any contract awarded as a result of this RFP will contain PART I - The Schedule, PART II - Contract Clauses, and PART III, Section J - List of Documents, Exhibits and Other Attachments (excluding those attachments including in this RFP relating to submission of proposals). Blank areas appearing in these sections, indicated by "[]" will be completed prior to contract award.

Offerors should carefully review the information contained therein, and, as appropriate, state any proposed exceptions/deviations per FAR 52.215-1.

L.4 PARTICIPATION BY FEDERALLY FUNDED RESEARCH AND DEVELOPMENT CENTERS (FFRDC) AND DEPARTMENT OF ENERGY (DOE) MANAGEMENT AND OPERATIONS (M&O) CONTRACTORS (DEC 2000)

A. PROPOSED USE OF A DOE M&O CONTRACTOR

Proposals submitted by, or substantially relying upon the technical expertise of, (1) another Federal agency; (2) a Federally Funded Research and Development Center (FFRDC) sponsored by a Federal agency; or (3) a Department of Energy (DOE) Management and Operating (M&O) contractor are not desired, will not be evaluated, and will not be eligible for an award under this solicitation. Offerors are encouraged to maximize the use of private sector organizations in the performance of the proposed effort. However, a proposal that includes performance by a FFRDC or DOE M&O contractor(s) may be considered for award, provided that: (1) the proposed use of any such entities is specifically authorized by the cognizant agency for the FFRDC or DOE for DOE M&O contractors, in accordance with the procedures established for the FFRDC or the DOE M&O contractor; (2) the work is not otherwise available from the private sector; and (3) the estimated aggregate cost of the FFRDC or M&O contractor(s) work does not exceed 25 percent of the total estimated project cost. DOE reserves the right to fund the work through a DOE field work proposal or an interagency agreement. If so, DOE will not reimburse the prime contractor or higher-tiered subcontractor, for indirect costs (e.g. overhead and/or G&A) allocated to the FFRDC or M&O subcontract costs

B. PROPOSAL SUBMISSION REQUIREMENTS

In addition to the proposal information to be provided by the offeror as set forth in other parts of this Section L, the following requirements apply:

1. Justification.

The offeror shall submit a letter with its proposal (Volume I) which states that to the best of its knowledge, the work requested will not place the FFRDC or the DOE M&O contractor(s) in direct competition with the domestic private sector, and that the proposed scope of work cannot be performed by any private entity.

2. Work Scope.

The proposal must provide a detailed scope of work which clearly identifies that portion of the proposed effort to be performed by the offeror and a separate scope of work for the effort to be performed by the FFRDC or DOE M&O contractor(s). This detailed scope of work shall be provided as an appendix to the Volume II, Technical Proposal.

3. Cost Information.

The offeror shall provide cost information for that portion of the proposed work scope (see 2, above) to be performed by a FFRDC or DOE M&O contractor(s). The cost information shall be furnished in the same format and level of detail as prescribed for subcontractors. If a contractor uses an FFRDC or DOE M&O contractor to perform a portion of the work, the contractor's cost sharing shall be based on the total cost of the project, including both the contractor's and the FFRDC or DOE M&O's portions of the effort. The estimated cost of the effort shall be clearly identified in the Volume III, Cost Proposal.

4. Authorization from the DOE Contracting Officer

The applicant must submit a document from the DOE Contracting Officer or authorized designee stating that the DOE M&O contractor is authorized to participate in the proposed effort.

L.5 RESPONSIBLE PROSPECTIVE CONTRACTORS (JUNE 1999)

All responsible individuals, corporations, non-profit organizations, educational institutions, and state or local governments may submit proposals for consideration. The general and additional minimum standards for responsible prospective Contractors set forth at FAR 9.1 apply.

DOE may conduct preaward surveys in accordance with FAR 9.106 and may solicit from available sources, relevant information concerning the offeror's record of past performance, and use such information in making determinations of prospective offeror responsibility.

L.6 TIME, DATE AND PLACE PROPOSALS ARE DUE (JAN 2000)

The date and time for submission of proposals shall be NO LATER THAN January 23, 2001, 4:00 p.m., local prevailing time at the place designated for receipt of proposals. (See the proposal submission instructions, including the provision describing treatment of late submissions, modifications, and withdrawals of proposals.)

- Proposal Submission by U.S. Mail

Proposals must be received at the following mailing address:

U. S. Department of Energy
National Energy Technology Laboratory
P.O. Box 10940, MS 921-107
Pittsburgh, PA 15236-0940

- Proposal Submission by Other than U.S. Mail

Offerors electing to submit proposals by means other than the U.S. Mail, including commercial courier service, assume the full responsibility of insuring that proposals are received at the following hand-carry address by the date and time specified above:

U.S. Department of Energy
National Energy Technology Laboratory
626 Cochran's Mill Road
Building 921, Room 164
Pittsburgh, PA 15236-0940

Such proposals must be closed and sealed as if for mailing.

- External Marking of Proposals

Proposals shall be marked with the following information:

- (1) Address of Proposer
- (2) Solicitation Number
- (3) Due Time and Date of Proposals

L.7 INTENTION TO PROPOSE (MAR 1999)

To enable us to anticipate the number of submissions to be evaluated, please complete the information in the Intention to Propose form contained in **Section J** and return to the addressee shown via mail, facsimile or e-mail, by the earliest practical date.

L.8 NUMBER OF AWARDS (NOV 1997)

It is anticipated that there will be multiple awards (2 or more) resulting from this solicitation. However, the Government reserves the right to make any number of awards, or no award, if considered to be in the Government's best interest to do so.

L.9 52.215-1 INSTRUCTIONS TO OFFERORS--COMPETITIVE ACQUISITION. (FEB 2000) -- ALTERNATE I (OCT 1987)

(a) Definitions. As used in this provision--

"Discussions" are negotiations that occur after establishment of the competitive range that may, at the Contracting Officer's discretion, result in the offeror being allowed to revise its proposal.

"In writing" or "written" means any worded or numbered expression which can be read, reproduced, and later communicated, and includes electronically transmitted and stored information.

"Proposal modification" is a change made to a proposal before the solicitation's closing date and time, or made in response to an amendment, or made to correct a mistake at any time before award.

"Proposal revision" is a change to a proposal made after the solicitation closing date, at the request of or as allowed by a Contracting Officer as the result of negotiations.

"Time," if stated as a number of days, is calculated using calendar days, unless otherwise specified, and will include Saturdays, Sundays, and legal holidays. However, if the last day falls on a Saturday, Sunday, or legal holiday, then the period shall include the next working day.

- (b) Amendments to solicitations. If this solicitation is amended, all terms and conditions that are not amended remain unchanged. Offerors shall acknowledge receipt of any amendment to this solicitation by the date and time specified in the amendment(s).
- (c) Submission, modification, revision, and withdrawal of proposals. (1) Unless other methods (e.g., electronic commerce or facsimile) are permitted in the solicitation, proposals and modifications to proposals shall be submitted in paper media in sealed envelopes or packages (i) addressed to the office specified in the solicitation, and (ii) showing the time and date specified for receipt, the solicitation number, and the name and address of the offeror. Offerors using commercial carriers should ensure that the proposal is marked on the outermost wrapper with the information in paragraphs (c)(1)(i) and (c)(1)(ii) of this provision.
 - (2) The first page of the proposal must show--
 - (i) The solicitation number;
 - (ii) The name, address, and telephone and facsimile numbers of the offeror (and electronic address if available);
 - (iii) A statement specifying the extent of agreement with all terms, conditions, and provisions included in the solicitation and agreement to furnish any or all items upon which prices are offered at the price set opposite each item;
 - (iv) Names, titles, and telephone and facsimile numbers (and electronic addresses if available) of persons authorized to negotiate on the offeror's behalf with the Government in connection with this solicitation; and
 - (v) Name, title, and signature of person authorized to sign the proposal. Proposals signed by an agent shall be accompanied by evidence of that agent's authority, unless that evidence has been previously furnished to the issuing office.

- (3) Submission, modification, revision, and withdrawal of proposals. (i) Offerors are responsible for submitting proposals, and any modifications or revisions, so as to reach the Government office designated in the solicitation by the time specified in the solicitation. If no time is specified in the solicitation, the time for receipt is 4:30 p.m., local time, for the designated Government office on the date that proposal or revision is due.
- (ii) (A) Any proposal, modification, or revision received at the Government office designated in the solicitation after the exact time specified for receipt of offers is "late" and will not be considered unless it is received before award is made, the Contracting Officer determines that accepting the late offer would not unduly delay the acquisition; and--
- (1) If it was transmitted through an electronic commerce method authorized by the solicitation, it was received at the initial point of entry to the Government infrastructure not later than 5:00 p.m. one working day prior to the date specified for receipt of proposals; or
- (2) There is acceptable evidence to establish that it was received at the Government installation designated for receipt of offers and was under the Government's control prior to the time set for receipt of offers; or
- (3) It is the only proposal received.
- (B) However, a late modification of an otherwise successful proposal that makes its terms more favorable to the Government, will be considered at any time it is received and may be accepted.
- (iii) Acceptable evidence to establish the time of receipt at the Government installation includes the time/date stamp of that installation on the proposal wrapper, other documentary evidence of receipt maintained by the installation, or oral testimony or statements of Government personnel.
- (iv) If an emergency or unanticipated event interrupts normal Government processes so that proposals cannot be received at the office designated for receipt of proposals by the exact time specified in the solicitation, and urgent Government requirements preclude amendment of the solicitation, the time specified for receipt of proposals will be deemed to be extended to the same time of day specified in the solicitation on the first work day on which normal Government processes resume.

- (v) Proposals may be withdrawn by written notice received at any time before award. Oral proposals in response to oral solicitations may be withdrawn orally. If the solicitation authorizes facsimile proposals, proposals may be withdrawn via facsimile received at any time before award, subject to the conditions specified in the provision at 52.215-5, Facsimile Proposals. Proposals may be withdrawn in person by an offeror or an authorized representative, if the identity of the person requesting withdrawal is established and the person signs a receipt for the proposal before award.
- (4) Unless otherwise specified in the solicitation, the offeror may propose to provide any item or combination of items.
- (5) Offerors shall submit proposals in response to this solicitation in English, unless otherwise permitted by the solicitation, and in U.S. dollars, unless the provision at FAR 52.225-17, Evaluation of Foreign Currency Offers, is included in the solicitation.
- (6) Offerors may submit modifications to their proposals at any time before the solicitation closing date and time, and may submit modifications in response to an amendment, or to correct a mistake at any time before award.
- (7) Offerors may submit revised proposals only if requested or allowed by the Contracting Officer.
- (8) Proposals may be withdrawn at any time before award. Withdrawals are effective upon receipt of notice by the Contracting Officer.
- (d) Offer expiration date. Proposals in response to this solicitation will be valid for the number of days specified on the solicitation cover sheet (unless a different period is proposed by the offeror).
- (e) Restriction on disclosure and use of data. Offerors that include in their proposals data that they do not want disclosed to the public for any purpose, or used by the Government except for evaluation purposes, shall--
 - (1) Mark the title page with the following legend:

This proposal includes data that shall not be disclosed outside the Government and shall not be duplicated, used, or disclosed--in whole or in part--for any purpose other than to evaluate this proposal. If, however, a contract is awarded to this offeror as a result of--or in connection with--the submission of this data, the Government shall have the right to duplicate, use, or disclose the data to the extent provided in the resulting contract. This restriction does not limit the Government's right to use information contained in this data if it is obtained from another source without restriction. The data subject to this restriction are contained in sheets [**Contractor to insert numbers or other identification of sheets**]; and

(2) Mark each sheet of data it wishes to restrict with the following legend:

Use or disclosure of data contained on this sheet is subject to the restriction on the title page of this proposal.

- (f) Contract award. (1) The Government intends to award a contract or contracts resulting from this solicitation to the responsible offeror(s) whose proposal(s) represents the best value after evaluation in accordance with the factors and subfactors in the solicitation.
- (2) The Government may reject any or all proposals if such action is in the Government's interest.
- (3) The Government may waive informalities and minor irregularities in proposals received.
- (4) The Government intends to evaluate proposals and award a contract after conducting discussions with offerors whose proposals have been determined to be within the competitive range. If the Contracting Officer determines that the number of proposals that would otherwise be in the competitive range exceeds the number at which an efficient competition can be conducted, the Contracting Officer may limit the number of proposals in the competitive range to the greatest number that will permit an efficient competition among the most highly rated proposals. Therefore, the offeror's initial proposal should contain the offeror's best terms from a price and technical standpoint.
- (5) The Government reserves the right to make an award on any item for a quantity less than the quantity offered, at the unit cost or prices offered, unless the offeror specifies otherwise in the proposal.
- (6) The Government reserves the right to make multiple awards if, after considering the additional administrative costs, it is in the Government's best interest to do so.
- (7) Exchanges with offerors after receipt of a proposal do not constitute a rejection or counteroffer by the Government.
- (8) The Government may determine that a proposal is unacceptable if the prices proposed are materially unbalanced between line items or subline items. Unbalanced pricing exists when, despite an acceptable total evaluated price, the price of one or more contract line items is significantly overstated or understated as indicated by the application of cost or price analysis techniques. A proposal may be rejected if the Contracting Officer determines that the lack of balance poses an unacceptable risk to the Government.
- (9) If a cost realism analysis is performed, cost realism may be considered by the source selection authority in evaluating performance or schedule risk.

- (10) A written award or acceptance of proposal mailed or otherwise furnished to the successful offeror within the time specified in the proposal shall result in a binding contract without further action by either party.
- (11) The Government may disclose the following information in postaward debriefings to other offerors:
 - (i) The overall evaluated cost or price and technical rating of the successful offeror;
 - (ii) The overall ranking of all offerors, when any ranking was developed by the agency during source selection;
 - (iii) A summary of the rationale for award; and
 - (iv) For acquisitions of commercial items, the make and model of the item to be delivered by the successful offeror.

L.10 52.216-1 TYPE OF CONTRACT (APR 1984-R)

The Government contemplates award of a “Cost Reimbursement No Fee Contract” or a “Cost Sharing Contract,” whichever is more advantageous to the Government, as explained in the Executive Summary Letter.

L.11 FALSE STATEMENTS (NOV 1997)

Proposals must set forth full, accurate, and complete information as required by this solicitation (including attachments). The penalty for making false statements in proposals is prescribed in 18 U.S.C. 1001.

L.12 EXPENSES RELATED TO OFFEROR SUBMISSIONS (FEB 1998)

This solicitation does not commit the Government to pay any costs incurred in the submission of any proposal or in making necessary studies or designs for the preparation thereof or to acquire or contract for any services.

L.13 ALTERNATE PROPOSAL INFORMATION - NONE (NOV 1997)

Alternate proposals are not solicited, are not desired, and shall not be evaluated.

L.14 AMENDMENT OF THE SOLICITATION (JAN 2000)

The only method by which any term of this solicitation may be modified is by an express, formal amendment to the solicitation generated by the issuing office. No other communication made at any scheduled preproposal conference or subsequent discussions, whether oral or in writing, will modify or supersede the terms of this solicitation. All amendments to this RFP will be posted on the NETL Homepage at "<http://www.netl.doe.gov/business/solicit/>". Receipt of an amendment to a solicitation by an offeror must be acknowledged and received prior to the hour and date specified for receipt of offers.

L.15 CLASSIFIED MATERIAL - NONE (NOV 1997)

Performance under the proposed contract is not anticipated to involve access to classified material.

L.16 PREPROPOSAL CONFERENCE IS NOT PLANNED (NOV 1997)

A preproposal conference for this solicitation is not contemplated.

L.17 AN EQUAL RIGHTS NOTE (NOV 1997)

Wherever, in the solicitation or contract "man," "men," or their related pronouns may appear, either as words or as parts of words (and other than with obvious reference to named male individuals), they have been used for literary purposes and are meant in their generic sense (i.e., to include all humankind - both female and male sexes).

L.18 SMALL BUSINESS SIZE STANDARDS AND SET-ASIDE INFORMATION (UNRESTRICTED) (MAY 1999)

This acquisition is unrestricted and contains no set-aside provisions.

L.19 PROPOSAL PREPARATION INSTRUCTIONS -- GENERAL (MAR 1999)

To aid in evaluation, proposals shall be clearly and concisely written as well as being neat, indexed (cross-indexed as appropriate), and logically assembled. All pages of each part shall be appropriately numbered, and identified with the name of the offeror, the date, and the solicitation number to the extent practicable.

The proposal is to clearly and fully demonstrate the offeror's capability, knowledge, experience, and expertise with regard to the requirements described herein. Simply stating that the offeror understands and will comply with technical and management requirements is not adequate. Similarly, phrases such as "standard procedures will be employed" or "well-known techniques will be used" are also inadequate.

Overall Arrangement of Proposal.

The overall proposal shall consist of three (3) physically separate volumes, individually entitled as stated below. The required number of each proposal volume is shown below:

<u>PROPOSAL VOLUME -- TITLE</u>	<u>ORIGINAL</u>	<u>COPIES</u>	<u>PAGE LIMITATION</u>
Volume I -- Offer and Other Documents	1	2	None
Volume II -- Technical Proposal	1	5	50
			[See Para.L.23]
Volume III -- Cost Proposal	1	3	None

The text of each proposal volume shall be typed, single-spaced, using Elite size (or equivalent, such as times-roman, courier, or arial), 12 pitch type (or equivalent), and printed, unreduced on size 8 1/2-inch by 11-inch paper. For interpretation of page limitation guidelines, the front and back of a single sheet are counted as two pages. Illustrations shall be legible and no longer than 11-inch by 17-inch fold-outs, as appropriate for the subject matter. Each 11-inch by 17-inch fold-out is considered two pages when determining the number of pages. Pages of each volume shall be sequentially numbered with the volume and page numbers on each page. Except as otherwise noted in the solicitation, the page guidelines set forth constitute a limitation on the total amount of material that may be submitted for evaluation. No material may be incorporated in any proposal by reference as a means to circumvent the page limitation.

Offerors are not to provide proposal information in three-ring binders.

NOTE: Each proposal will be prepared for a specific subtopic for example:

- 1) Ground Water Technologies.**
- 2) Soil Characterization.**
- 3) Contaminant Fate and Transport for Risk-Based Remedial Decision Making.**

If the Offeror's technology is applicable to more than one subtopic, it is required that the Offeror submit a separate proposal for each subtopic. This will help in the evaluation of the proposals because there will be a separate team for each subtopic to perform the technical evaluation.

L.20 PREPARATION INSTRUCTIONS: VOLUME I - OFFER AND OTHER DOCUMENTS (MAR 1999-R)

Volume I, Offer and Other Documents, consists of the actual offer to enter into a contract to perform the desired work, other documents requiring the signature of the offeror's authorized representative, and the offeror's description of its business and management approaches to satisfying the Statement of Work and its capability to perform the work.

FORMAT AND CONTENT

Volume I, Offer and Other Documents, shall include the following documents (in the order listed):

1. The SF33 Form -- Solicitation, Offer and Award (Page 1 of this solicitation)
 - (a) Offerors shall complete Blocks 12, 15A, 15B, 15C, 16, and sign in block 17. The SF33 is to be fully executed, including the acknowledgment of amendments, if applicable, and signed by an authorized individual of the proposing organization. Two signed originals shall be included.
 - (b) The offeror's Acceptance Period (See Block 12) entered shall not be less than 180 days.
 - (c) Signature Authority. The person signing the SF33 must have the authority to commit the offeror to all of the provisions of the proposal, fully recognizing that the Government has the right, by terms of the solicitation, to make an award without further discussion if it so elects.
 - (d) Non-Government Personnel. If the Offeror objects to non-government "technical, scientific and/or peer reviewers," it should so state here.
2. Offeror Representations and Certifications Fully Executed

Offeror Representations and Certifications included under Section K of this solicitation are to be fully executed and a copy included in each copy of Volume I, Offer and Other Documents. As stated in Section K, should an offeror be selected for further negotiations, he must certify to the certifications referenced.

3. Supporting Data

The supporting data to be included in Volume I shall include all of the following information:

- (a) The suitability of proposed teaming agreements among participants (including subcontractors).

- (b) A discussion of the proposed involvement of qualified and capable small and small socially and economically disadvantaged business concerns. This section shall also contain the offerors commitment to, on request, submit and negotiate in good faith a Small and Small Disadvantaged Business Subcontracting Plan in accordance with FAR 52.219-9 of this solicitation.

4. Exceptions and Deviations

The offeror shall identify and explain any exceptions or deviations taken or conditional assumptions made with respect to the model contract, Offeror Representations and Certifications, and the requirements included in Volume I -- Offer and Other Documents, Volume II -- Technical Proposal and Volume III -- Cost Proposal. Any exceptions taken must contain sufficient justification to permit evaluation. The benefit to the Government shall be explained for each exception taken. Such exceptions will not, of themselves, automatically cause a proposal to be termed unacceptable. A large number of exceptions, or one or more significant exceptions not providing benefit to the Government, however, may result in rejection of your proposal(s) as unacceptable. Offerors who object to review of their proposal by persons other than Government employees shall so state in this Volume I. Again, offerors are cautioned that DOE may be unable to give full consideration to proposals which indicate that only Government evaluation is authorized.

L.21 ENVIRONMENTAL, HEALTH, SAFETY AND SOCIETY IMPACT (MAR 1999)

Should the Offeror be selected for further negotiations leading to contract award, the Offeror will be required to submit a completed Environmental Assessment Questionnaire (see Section J, Attachment F). This will be a detailed, self-contained document summarizing the proposed action, its alternatives, the existing environment, anticipated impacts from the project, and any regulatory compliance necessary. DOE shall use this questionnaire to evaluate the potential impacts of the proposed project, and at the earliest possible time, whether execution of the proposed activities will require an Environmental Assessment (EA), an Environmental Impact Statement (EIS), or can be covered under a Categorical Exclusion (CX). If the environmental impacts are considered significant, the selectee, prior to award, will be required to prepare the Environmental Compliance Plan, an Environmental Monitoring Plan, and Environmental Report. Contract award will be made after the environmental material submitted by the respective contractor has been reviewed and accepted by DOE.

L.22 52.204-6 DATA UNIVERSAL NUMBERING SYSTEM (DUNS) NUMBER (JUN 1999)

- (a) The offeror shall enter, in the block with its name and address on the cover page of its offer, the annotation "DUNS" followed by the DUNS number that identifies the offeror's name and address exactly as stated in the offer. The DUNS number is a nine-digit number assigned by Dun and Bradstreet Information Services.

- (b) If the offeror does not have a DUNS number, it should contact Dun and Bradstreet directly to obtain one. A DUNS number will be provided immediately by telephone at no charge to the offeror. For information on obtaining a DUNS number, the offeror, if located within the United States, should call Dun and Bradstreet at 1-800-333-0505. The offeror should be prepared to provide the following information:
- (1) Company name.
 - (2) Company address.
 - (3) Company telephone number.
 - (4) Line of business.
 - (5) Chief executive officer/key manager.
 - (6) Date the company was started.
 - (7) Number of people employed by the company.
 - (8) Company affiliation.
- (c) Offerors located outside the United States may obtain the location and phone number of the local Dun and Bradstreet Information Services office from the Internet home page at <http://www.customerservice@dnb.com/>. If an offeror is unable to locate a local service center, it may send an e-mail to Dun and Bradstreet at globalinfo@mail.dnb.com.

L.23 PREPARATION INSTRUCTIONS: VOLUME II - TECHNICAL PROPOSAL (OCT 2000)

Volume II - Technical Proposal will be used to assess both the scientific merit of the proposed work and its relevance to both DOE's current programmatic objectives and the objectives of this solicitation (see Part I, Section J, Attachment A) The technical proposal must be self-contained and written in a clear and concise manner. The proposal shall be definitive with respect to the research which the offeror actually proposes to conduct. If the proposal is selected for comprehensive evaluation, the criteria specified in Section M shall be applied.

The maximum number of pages for the Technical Proposal shall be limited to 50 pages. For interpretation of page guidelines, reference the clause entitled, "Proposal Preparation Instructions -- General". Note that the Cover Sheet and Public Abstract are not included in the page limitation, but the Resumes, Table of Contents and other Pertinent Publications are included in the page limitation. The Statement of Work shall not exceed 3 pages, and is included in the technical proposal's 50 page limit.

To ensure that the technical proposal is evaluated strictly on its own merit, no cost information shall be included.

FORMAT AND CONTENT

The offeror shall include a technical discussion in the format specified below. This format relates to the technical evaluation criteria found in Section M. Alternate heading names and additional headings may be included as desired.

1. Cover Sheet.

A completed and signed cover sheet as per FAR 52.215-1 shall be used. The title of the proposed effort should be concise and descriptive of the work to be performed.

2. Public Abstract.

This section shall contain a concise public abstract of no more than 500 typewritten words clearly stating the objectives of the proposed research, the title of the project, methodology, sponsoring organization(s), and time frame. Not more than two 8 1/2 by 11 inch diagrams may be included with the abstract. The abstract is to provide an overview of the proposed project objectives. It is a stand-alone document. This abstract may be released to the public by DOE in whole or in part at anytime. It is therefore required that it shall not contain proprietary data or confidential business information. The offeror shall indicate a point of contact for coordination, preparation and distribution of press releases.

3. Table of Contents.

In order to produce a comprehensive application for this solicitation, the offeror should address, at a minimum, the areas listed below. To help facilitate the review process and to insure addressing all the review criteria, the offeror shall use the following Table of Contents when preparing the technical application.

4. Technical Discussion.	<u>Page</u>
a. UNDERSTANDING OF OBJECTIVES AND APPLICABILITY TO DOE NEEDS	
(1) Objective and Background	1
(2) Understanding of the Site Needs/Problems and Applicability	#
(3) Description of the Potential Benefits of the Technology/Concept	#
(4) Maturity and Description of the Technology/Concept	#
(5) Prior Uses of Proposed Technology, if any	#
(6) Understanding of the Technical Area and Competing Technologies	#
(7) Technology Application across DOE Complex	#
b. TECHNICAL APPROACH	
(1) Project Implementation Methodology	#
(2) Discussion of Regulatory, Environmental and other Issues	#
(3) Potential Technical Problems, if any	#
(4) Development of Statement of Work	#
(5) Test Plan, Logistics and Issues	#
(6) Success Criteria of the proposed work	#
(7) Schedule Requirements	#
(8) Labor Hours/Staffing	#
c. CAPABILITIES, COMMITMENT, AND ORGANIZATIONAL EXPERIENCE	
(1) Project Management and Organization	#
(2) Project Organizational Structure	#
(3) Technical and management Experience	#
(4) Previous Experience	#
(5) Motivation and Commitment	#
d. FACILITIES AND EQUIPMENT	
(1) Availability of Facilities and Equipment	#
(2) Existing Permit and Licenses	#
(3) Discussion of Equipment and Materials Purchases	#

TABLE OF CONTENTS

Page

A. PUBLIC ABSTRACT

B. TABLE OF CONTENTS

List of Tables
List of Figures
List of Acronyms

C. TECHNICAL DISCUSSION

This section shall contain the major portion of the Technical Proposal. It shall clearly address each of the Technical Proposal evaluation criteria in Part IV -- Section M, and at a minimum cover the factors listed below.

Note: It is critical that the offeror's Technical Discussion clearly address each 'element' cited herein; these elements are structured to correlate one-to-one with the weighted evaluation criterion given in Section M of this solicitation. Failure to comprehensively address any element can adversely impact the favorable evaluation of your technical proposal.

1. GENERAL.

- a. Volume II, Technical Proposal, consists of the offeror's outline demonstrating the reasonableness, completeness, and merit of its approach to the technical management aspects of the solicitation.
- b. In order that the Technical Proposal may be evaluated strictly on its own merit, no cost information shall be included.
- c. The proposed Statement of Work should reflect the requirements and objectives of the work to be performed; therefore, repeating the scope of work without sufficient elaboration will not be acceptable.
- d. The Technical Proposal shall not exceed 50 pages. For interpretation of page guidelines, reference Provision L.19, Proposal Preparation Instructions--General. Note that the Statement of Work, Resumes, and other Pertinent Publications are included in the 50-page limitation.

2. SPECIFIC.

a. Understanding of Objectives and Applicability to DOE Needs

The offeror shall provide a project objective(s), background and description of the innovative or improved technology, its intended use(s) in subsurface contaminant applications.

The offeror shall discuss their understanding of the Department of Energy (DOE) Subsurface Contaminants need(s) or problem(s) being addressed and, understanding of deficiencies of current technologies and feasibility of offeror's technology to overcome the deficiencies.

The offeror shall discuss the state of maturity of the proposed technology or concept.

The offeror shall provide a clear description of the project objective(s) and expected performance of the equipment, device, or process and the potential benefits of the proposed innovative or improved technology in terms of anticipated performance and/or cost savings over potential baseline technologies. Supporting performance data and cost advantages (in terms of percentages) information shall be provided to substantiate the claims of benefits.

The offeror shall discuss extent of prior use, research, development or application of the proposed technology and appropriateness of how the prior work relates to the proposed application of the technology.

The offeror shall provide a discussion of the applicability of the innovative/improved technology to address multiple needs at multiple DOE facilities, and the potential DOE complex-wide benefits of the innovative/improved technology relative to cost savings and safety benefits.

b. Technical Approach

The offeror shall discuss its proposed approach for research and development of the innovative or improved technology/concept including identification of relevant technical, regulatory, environmental, economic, production, or other significant issues.

The offeror shall provide a discussion of the potential technical issues and proposed resolution for the research and development of the proposed technology, concept or process.

The offeror shall provide a Statement of Work (SOW) which divides the work into logical tasks and subtasks necessary to accomplish the project objective(s). The SOW shall be included in Appendix A and shall not exceed 3 pages in length; it will count toward the 50-page technical proposal limitation. The offeror shall provide a clear description of the work to be performed under each task. The SOW shall be written in active voice and shall contain necessary and sufficient information to estimate the cost of the work.

The offeror shall discuss the preliminary test plan and other logistics of the proposed work.

The offeror shall provide a tentative schedule of the events after the offeror's system arrives at the specific site to mobilize, demonstrate, and demobilize the technology.

The offeror shall provide a discussion regarding scheduling of the technology development work.

The offeror shall provide a table listing the estimated labor hours and labor categories (e.g., engineering, manufacturing, scientific, technician, analytical, clerical) required for the proposed work. It is not sufficient to merely indicate a certain number of hours; a determination as to why that number of hours is required. In addition, the hours shall be related to the specific tasks to be performed and, as far as possible, shall indicate the job disciplines and classifications (engineering, manufacturing, scientific) under each task. The offeror shall detail labor hours and labor categories for any proposed subcontracting or consulting effort for each task. It should also indicate the extent to which the offeror has previously worked with the proposed consultant or subcontractor. No pricing information shall be included in the Technical Proposal. The offeror shall explain the purpose of the subcontract or consulting effort.

The offeror shall provide its plan for staffing to support the proposed work.

c. Capabilities, Commitment, and Organizational Experience

The offeror shall describe relevant technical and management experience, availability of proposed personnel on the project including subcontractors, and prior experience in managing projects similar in type, technology, size, and complexity.

The offeror shall provide a project organization structure and the lines of authority, both technical and administrative. Resumes of key personnel should be provided and included in Appendix B.

The offeror shall discuss their commitment to develop and test innovative/improved technology.

The offeror shall discuss their motivation of the organization for being involved in the proposed effort including plans and commitment to commercialize and deploy the technology.

The offeror shall discuss any outside commitments which might conflict with performance of this project. The offeror shall indicate their degree of ownership and control of the technology.

d. Facilities and Equipment

The offeror shall discuss the availability of the equipment and appropriate facility to perform the intended work.

The offeror shall discuss the existence of any licenses, patents, royalties, or intellectual property rights which could impact future use of the technology by DOE and others.

The offeror shall discuss in detail the required purchases of the capital equipment and materials and supplies and provide a justification.

D. TECHNICAL EXCEPTIONS AND DEVIATIONS

E. APPENDICES

A. STATEMENT OF WORK

B. RESUMES

C. ADDITIONAL PERTINENT PUBLICATIONS/PAST PERFORMANCE REVIEWS/ LETTERS OF ACCOMMODATION (if any)

L.24 PREPARATION INSTRUCTIONS: VOLUME III - COST PROPOSAL

- A. Format and Content. Volume III - Cost Proposal shall consist of the offeror's estimated costs to perform the desired work as set forth in the SOW. Since the Cost Proposal shall be 1) evaluated to determine cost realism and the offeror's understanding of the magnitude of effort and 2) used as the basis for any necessary cost negotiation, the Cost Proposal shall be accurate, complete, and well documented. As prescribed by FAR 52.215-20 with Alternate 1, the offeror shall submit cost or pricing data and supporting attachments in accordance with the Cost Proposal Preparation Instructions/Format provided herein (see Section J, Attachment H to the solicitation).

L.25 52.215-20 REQUIREMENTS FOR COST OR PRICING DATA OR INFORMATION OTHER THAN COST OR PRICING DATA. (OCT 1997) -- ALTERNATE I (OCT 1997)

(a) Exceptions from cost or pricing data.

- (1) In lieu of submitting cost or pricing data, offerors may submit a written request for exception by submitting the information described in the following subparagraphs. The Contracting Officer may require additional supporting information, but only to the extent necessary to determine whether an exception should be granted, and whether the price is fair and reasonable.
 - (i) Identification of the law or regulation establishing the price offered. If the price is controlled under law by periodic rulings, reviews, or similar actions of a governmental body, attach a copy of the controlling document, unless it was previously submitted to the contracting office.
 - (ii) Commercial item exception. For a commercial item exception, the offeror shall submit, at a minimum, information on prices at which the same item or similar items have previously been sold in the commercial market that is adequate for evaluating the reasonableness of the price for this acquisition. Such information may include--
 - (A) For catalog items, a copy of or identification of the catalog and its date, or the appropriate pages for the offered items, or a statement that the catalog is on file in the buying office to which the proposal is being submitted. Provide a copy or describe current discount policies and price lists (published or unpublished), e.g., wholesale, original equipment manufacturer, or reseller. Also explain the basis of each offered price and its relationship to the established catalog price, including how the proposed price relates to the price of recent sales in quantities similar to the proposed quantities;
 - (B) For market-priced items, the source and date or period of the market quotation or other basis for market price, the base amount, and applicable discounts. In addition, describe the nature of the market;
 - (C) For items included on an active Federal Supply Service Multiple Award Schedule contract, proof that an exception has been granted for the schedule item.

- (2) The offeror grants the Contracting Officer or an authorized representative the right to examine, at any time before award, books, records, documents, or other directly pertinent records to verify any request for an exception under this provision, and the reasonableness of price. For items priced using catalog or market prices, or law or regulation, access does not extend to cost or profit information or other data relevant solely to the offeror's determination of the prices to be offered in the catalog or marketplace.
- (b) Requirements for cost or pricing data. If the offeror is not granted an exception from the requirement to submit cost or pricing data, the following applies:
- (1) The offeror shall submit cost or pricing data and supporting attachments in the format prescribed in Section J, Attachment H.
 - (2) As soon as practicable after agreement on price, but before contract award (except for unpriced actions such as letter contracts), the offeror shall submit a Certificate of Current Cost or Pricing Data, as prescribed by FAR 15.406-2.

L.26 952.227-84 NOTICE OF RIGHT TO REQUEST PATENT WAIVER (FEB 1998)

Offerors have the right to request a waiver of all or any part of the rights of the United States in inventions conceived or first actually reduced to practice in performance of the contract that may be awarded as a result of this solicitation, in advance of or within 30 days after the effective date of contracting. Even where such advance waiver is not requested or the request is denied, the contractor will have a continuing right under the contract to request a waiver of the rights of the United States in identified inventions, i.e., individual inventions conceived or first actually reduced to practice in performance of the contract. Domestic small businesses and domestic nonprofit organizations normally will receive the patent rights clause at DEAR 952.227-11 which permits the contractor to retain title to such inventions, except under contracts for management or operation of a Government-owned research and development facility or under contracts involving exceptional circumstances or intelligence activities. Therefore, small businesses and nonprofit organizations normally need not request a waiver. See the patent rights clause in the draft contract in this solicitation. See DOE's patent waiver regulations at 10 CFR part 784.

L.27 INFORMATION OF AWARD (NOV 1997)

Written notice to unsuccessful offerors and contract award information will be promptly released in accordance with DOE regulations applicable to negotiated acquisitions.

L.28 DISPOSITION OF SOLICITATION MATERIALS AND PROPOSALS (FEB 1998)

Drawings, specifications, and other documents supplied with the solicitation may be retained by the offeror (unless there is a requirement for a document to be completed and returned as a part of the offer).

Offeror's Proposals will not be returned (except for timely withdrawals).

L.29 52.233-2 SERVICE OF PROTEST. (AUG 1996)

- (a) Protests, as defined in section 33.101 of the Federal Acquisition Regulation, that are filed directly with an agency, and copies of any protests that are filed with the General Accounting Office (GAO), shall be served on the Contracting Officer (addressed as follows) by obtaining written and dated acknowledgment of receipt from:

Raymond D. Johnson
Contracting Officer
U.S. Department of Energy
National Energy Technology Center
P.O. Box 10940
Pittsburgh, PA 15236-0940

- (b) The copy of any protest shall be received in the office designated above within one day of filing a protest with the GAO.

L.30 952.233-2 SERVICE OF PROTEST. (APR 1995)

- (c) Another copy of a protest filed with the General Accounting Office shall be furnished to the following address within the time periods described in paragraph (b) of this clause: U.S. Department of Energy, Assistant General Counsel for Procurement and Financial Assistance (GC-61), 1000 Independence Avenue, S.W., Washington, DC 20585 Fax: (202) 586-4546.

L.31 952.233-4 NOTICE OF PROTEST FILE AVAILABILITY. (SEP 1996)

- (a) If a protest of this procurement is filed with the General Accounting Office (GAO) in accordance with 4 CFR Part 21, any actual or prospective offeror may request the Department of Energy to provide it with reasonable access to the protest file pursuant to FAR 33.104(a)(3)(ii), implementing section 1065 of Public Law 103-355. Such request must be in writing and addressed to the contracting officer for this procurement.

- (b) Any offeror who submits information or documents to the Department for the purpose of competing in this procurement is hereby notified that information or documents it submits may be included in the protest file that will be available to actual or prospective offerors in accordance with the requirements of FAR 33.104(a)(3)(ii). The Department will be required to make such documents available unless they are exempt from disclosure pursuant to the Freedom of Information Act. Therefore, offerors should mark any documents as to which they would assert that an exemption applies. (See 10 CFR part 1004.)

L.32 952.233-5 AGENCY PROTEST REVIEW. (SEP 1996)

Protests to the Agency will be decided either at the level of the Head of the Contracting Activity or at the Headquarters level. The Department of Energy's agency protest procedures, set forth in 933.103, elaborate on these options and on the availability of a suspension of a procurement that is protested to the agency. The Department encourages potential protesters to discuss their concerns with the contracting officer prior to filing a protest.

SECTION M - EVALUATION FACTORS FOR AWARD

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SECTION M - EVALUATION FACTORS FOR AWARD

M.1 GENERAL (MAR 1998-R)

Proposals will be evaluated in accordance with applicable DOE acquisition policies and procedures. Evaluation will be performed to determine: 1) the offeror's understanding of work to be performed, 2) technical approach, 3) potential for completing the work as specified in the solicitation, 4) cost reasonableness, 5) the probable cost to the Government, and 6) ranking with competing offerors.

The proposal preparation instruction contained in Section L of this solicitation are designed to provide guidance to the Offeror concerning the criteria that will be used to evaluate proposals.

Award will be made to that responsible offeror(s), whose offer(s), conforming to this solicitation, is (are) considered most advantageous to the Government, considering the Evaluation Criteria in this Section M.

M.2 EVALUATION CRITERIA (MAY 1999-R)

(a) Volume I - Offer and Other Documents

This volume will not be point scored, but rather will be evaluated on a 'pass/fail' basis (1) to ascertain the offeror's responsiveness in complying with the documentation requirements for Volume I - Offer and Other Documents, and (2) to determine the business management performance potential of the offeror, specifically, the offeror's identification of 'management systems and controls' and the manner in which they will be employed to ensure a well-planned, coordinated and controlled project that can be performed within time and budget constraints; some examples of management systems would be purchasing systems, accounting systems, property management systems, human resource management systems (i.e., organization lines of authority, responsibility), project management systems, etc.

1. *Contract*. The 'contract' will be reviewed for accuracy and completeness for the information required to be provided by the offeror, e.g.:
 - (i) areas in the 'model contract' which have clearly identified 'to be filled in by the offeror' are complete and the SF33 has been executed by an authorized individual of the submitting organization.
 - (ii) the *offeror's* Statement of Work is incorporated as Attachment A to Part III, Section J;
 - (iii) property requirements (contractor acquired or government furnished), if any, have been identified on Attachments C and D to Part III, Section J;
 - (iv) a "Small/Small Disadvantaged or Women-Owned Business Subcontracting Plan" has been provided as Attachment E to Part III, Section J, unless the offeror is exempt (i.e., small business status);

- (v) fully executed *Representations, Certification and Other Statements of the Offeror* are included for the offeror and each team member/subcontractor;
- (vi) a summary of 'exceptions and deviations taken or general assumptions made, if any, with respect to the model contract is provided.

2. *Business and Management Discussion.* The offeror's proposal will be evaluated to assess the degree of corporate commitment, the suitability of proposed teaming relationship/interrelationships, and the offeror's access to necessary resources, and utilization of key management systems to minimize performance risk.

(b) Volume II - Technical Proposal

Technical aspects of proposals will be evaluated in accordance with the following criteria which are listed in descending order of importance. Within each criterion, subcriteria are either listed in descending order of importance, or are approximately equal in weight.

The following criteria will be used to evaluate the reasonableness, completeness, merit, and relevance of the Offeror's technical proposal to successfully perform the solicitation requirements.

EVALUATION CRITERIA

CRITERION 1 -- Understanding of Objectives and DOE Needs (35%)

Proposals will be evaluated considering the offeror's understanding of the Department of Energy (DOE) subsurface Contaminants need(s) or problem(s) being addressed.

- (a) Soundness of the offeror's understanding of the overall PRDA objectives, and of the issues, needs, and problems defined in the proposed research area; understanding, extent of knowledge, and completeness and accuracy of comparison of current technologies if available, with the proposed technology; understanding of potential advantages, benefits and improvements of the proposed technology over current, commercial, and emerging technologies; and, understanding of deficiencies of current technologies and feasibility of offeror's technology to overcome the deficiencies.
- (b) Applicability of the proposed technology to one or more DOE sites; and understanding of the site characteristics necessary or desirable for use of the proposed technology.
- (c) Extent of prior use, research, development or application of the proposed technology and appropriateness of how the prior work relates to the proposed application of the technology.

CRITERION 2 -- Technical Approach (35%)

- (a) Completeness and appropriateness of discussion regarding potential technical, regulatory, environmental, economic, production or other issues to be addressed by the technical approach; soundness of scientific and engineering rationale; applicability of the proposed technology to the proposed research area; soundness and completeness of the Statement of Work (SOW) and technical approach for all phases; appropriateness and clarity of success criteria; and soundness and completeness of preliminary test plan. Identification of potential issues and proposed resolution of the issues for the development of the technology.
- (b) Reasonableness and appropriateness of schedule, milestones, proposed labor hours, labor categories, travel, consultants, and subcontractors.
- (c) Extent of available environmental information on the technical approach and project site(s); and significance of potential environmental, safety, and health impacts.

CRITERION 3. -- Capabilities, Commitment, and Organizational Experience (20%)

- (a) Extent and appropriateness of qualifications, and technical and managerial experience of the proposed personnel, subcontractors, and consultants; capabilities of project organization including technical knowledge, access to financial and technical resources, and project management abilities; and prior experience in managing projects similar in type, technology, size and complexity; and prior experience in obtaining permits and licenses and in dealing with environmental laws and regulations. If work requiring radioactive or hazardous material training is required, address the status of such training for the appropriate personnel.
- (b) Motivation of organization for being involved in proposed effort; priority of proposed effort relative to other commitments; commitment to deployment and commercialization and completeness and soundness of commercialization plan; and extent of existing licenses, patents, royalties, or intellectual property rights of the proposed technology.
- (c) Soundness and completeness of project organizational structure; identification of key personnel's functions and responsibilities; and availability and time commitments of proposed personnel.

CRITERION 4 -- Facilities and Equipment (10%)

Proposals will be evaluated considering the completeness, appropriateness and availability of proposed equipment, materials, and facilities; reasonableness of justification for purchase or lease of facilities, equipment, or materials; and, extent of existing permits and licenses related to operation of facilities. This evaluation will include whether the proposed facilities have the appropriate permits in place to work with the materials of concern in the proposed work.

(c) Volume III - Cost Proposal

1. The cost proposal will not be point, assigned a numerical weight, or adjectivally rated. The cost proposal will be evaluated in accordance with the following criteria:
 - (i) Offeror's understanding of the requirements.
 - (ii) Reasonableness and accuracy.
 - (iii) Cost Realism and appropriateness of cost.
 - (iv) Evaluated probable cost to the Government including any options.
2. The cost share by the Offeror is not desired in the Initial Phase, but will be preferred in Subsequent Phases. If as a result of the technical evaluation and the application of the cost evaluation criteria, two or more proposals are considered to be essentially equal, the percentage of cost share relative to the proposed cost may be the deciding factor in making the selection for award.
3. Selection of an offeror for award may involve a determination as to whether an otherwise technically superior proposal is worth any additional cost.

M.3 OVERALL RELATIVE IMPORTANCE OF EVALUATION CRITERIA (NOV 1997)

The technical proposal is of greater importance than the cost proposal. However, if, after evaluation of the technical and cost proposals, two or more competing overall proposals are within the competitive range, evaluated probable cost to the Government may be the deciding factor for selection, depending on whether the most acceptable overall proposal (excluding cost consideration) is determined to be worth the cost differential, if any. The offer and other documents proposal is to be evaluated for adequacy and compliance with the solicitation.

M.4 APPLICATION OF PROGRAM POLICY FACTORS AND SELECTION (OCT 1998-R)

(a) Program Policy Factors

These factors, while not indicators of the proposal's merit, e.g., technical excellence, cost, proposer's ability, etc., may be essential to the process of selecting the proposal(s) that, individually or collectively, will best achieve the program objectives. Such factors are often beyond the control of the offeror. Proposers should recognize that some very good proposals may not receive an award because they do not fit within a mix of projects which maximizes the probability of achieving the DOE's overall research and development objectives. Therefore, the following Program Policy Factors may be used by the Source Selection Official to assist in determining which of the ranked proposal(s) shall receive DOE funding support.

- It may be desirable to select project(s) for award of less technical merit than other project(s) if such a selection will optimize use of available funds, and distribute funds and projects among a larger number of research areas.
- It may be desirable to select project(s) for award which initiate work at higher maturity Gate levels and exhibit higher potential for expedient implementation.
- It may be desirable to select project(s) for award which will be applicable to multiple DOE sites.
- It may be desirable to select project(s) for award that represent a diversity of methods, approaches, or application of differing technology options.
- It may be desirable to select project(s) for award which minimize issues regarding siting, environmental permitting and the impact of regulatory issues.
- It may be desirable to select project(s) for award which represent a diversity of organizations (i.e., small businesses, educational institutions).
- It may be desirable to select project(s) for award which maximize the return on investment of previous Government funding.

The above factors will be independently considered by the Source Selection Official in determining the optimum mix of proposals that will be selected for support. These policy factors will provide the Source Selection Official with the capability of developing, from the competitive procurement, a broad involvement of organizations and organizational ideas, which both enhance the overall technology research effort and upgrade the program content to meet the goals of the DOE.

(b) Selection

The Source Selection Official will select a mix of proposals for award from the finding(s) established by the proposal evaluation panel. The Source Selection Official will take into account the relative technical, environmental, and business and management and cost rankings as well as applicable program policy factors in determining which proposal(s) will best satisfy program objectives.